



**THE GAMBIA**

**HUMAN CAPITAL DEVELOPMENT STRATEGY 2021-2024**

*[A Pillar of the Information and Communication Technology for Development Policy  
Statement 2018-2028]*

*Commissioned  
By  
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## 1. ACRONYMS AND ABBREVIATIONS

3G	<i>Third Generation (Wireless Mobile Telecommunications Technology)</i>
ACE Cable	<i>Africa Coast to Europe Cable</i>
COVID-19	<i>Corona Virus</i>
EBS	<i>Educational Broadcasting Services</i>
ECOWAN	<i>Ecowas Wide Area Network (Gambia's National Backbone)</i>
ECOWAS	<i>Economic Community of West African States</i>
ESP	<i>Education Sector Policy 2016-2030</i>
ESSP	<i>Education Sector Strategy Plan 2016-2030</i>
HR	<i>Human Resources</i>
GBOS	<i>Gambia Bureau of Statistics</i>
GC	<i>Gambia College</i>
GCCI	<i>Gambia Chamber of Commerce</i>
GDP	<i>Gross Domestic Product</i>
GNI	<i>Gross National Product</i>
GSQF	<i>The Gambia Skills Qualification Framework</i>
GTTI	<i>Gambia Technical Training Institute</i>
HCD	<i>Human Capital Development</i>
HDI	<i>Human Development Index</i>
ICT	<i>Information and Communications Technologies</i>
ICT Agency	<i>Gambia Information Communication Technology Agency</i>
ICT4D	<i>Information Communications Technology for Development Policy</i>
IMF	<i>International Monetary Fund</i>
ISCED	<i>International Standard Classification of Education</i>
IT	<i>Information Technology</i>
ITU	<i>International Telecommunication Union</i>
ITU-D	<i>ITU Telecommunication Development Sector</i>
LBE	<i>Lower Basic Education</i>
LGAs	<i>Local Government Authorities</i>
MDI	<i>Management Development Institute</i>
MoBSE	<i>Ministry of Basic and Secondary Education</i>
MoFEA	<i>Ministry of Finance and Economic Affairs</i>
MOHERST	<i>Ministry of Higher Education Research Science and Technology</i>
MOICI	<i>Ministry of Information and Communications Infrastructure</i>
MOLRG	<i>Ministry of Lands and regional Government</i>
MOTC	<i>Ministry of tourism and Culture</i>
MOTIE	<i>Ministry of Trade Industry and Employment</i>
MOYS	<i>Ministry of Youths and Sports</i>
NAQAA	<i>National Accreditation and Quality Assurance Authority</i>
NGN	<i>Next Generation Network</i>
NDP	<i>National Development Plan</i>

NEP 2004-2015	<i>National Education Policy 2004-2015</i>
NFE	<i>Non-Formal Education</i>
NGO	<i>Non-Governmental Organisation</i>
NTA Act 2002	<i>National Training Authority Act 2002</i>
ODF-1987	<i>Omar Dengo Foundation 1987</i>
OECD	<i>Organisation for Economic Co-operation and Development</i>
PAGE	<i>Programme for Accelerated Growth and Employment</i>
PCs	<i>Personal Computers</i>
PMO	<i>Personnel Management Office</i>
PPP	<i>Public Private Partnership</i>
PRS-2007-2011	<i>Poverty Reduction Strategy 2007-2011</i>
PSC	<i>Public Service Commission</i>
PSRSP	<i>Public Sector Reform Strategic Paper – 2007-2011</i>
PURA	<i>Public Utilities Regulatory Authority</i>
R&D	<i>Research and Development</i>
Q1, Q2, Q3, Q4	<i>Quarter 1, Quarter 2, Quarter 3 and Quarter 4</i>
R&D	<i>Research and Development</i>
SDGs	<i>Sustainable Development Goals</i>
STEM	<i>Science Technology Engineering and Mathematics</i>
STI	<i>Science Technology &amp; Innovation</i>
TVET	<i>Technical and Vocational Education and Training</i>
UNDP	<i>United Nations Development Programme</i>
HDR-2019	<i>Human Development Report 2019</i>
UNDP	<i>United Nations Development Programme</i>
UNESCO	<i>United Nations Educational Scientific and cultural Organisation</i>
UPE	<i>Universal Primary Education</i>
UTG	<i>University of The Gambia</i>
WB	<i>World Bank</i>

## 2. FORWARD

*This human capital development strategy is designed to guide the country in enhancing the general human capital development for ICTs and through ICTs. In understanding the nation's challenges and kaleidoscopic transformations imposed by the ICTs, our considered option is to value the opportunities for lifting our nation and its people from its grinding poverty. One key area is human capital development through education that will play an absolutely crucial role in enabling our nation to cross the threshold to prosperity by particular framework for developing the knowledge, skills, values and attitudes of our people.*

*The strategy centres on ensuring access to relevant and quality education for all. The purpose is to rebuild and help organizations optimize their resources for efficient and effective mission achievement by using ICTs. The strategy sets forth the ICT human capital goals and strategies for increasing the size of the IT staff within government and having them engaged on full time basis by reducing reliance on contractors for a number of Government service delivery as well as the creation of an environment with an increased level of productivity of the ICT staff in order to achieve quality in Government service delivery.*

*The unique targets include the creation of a critical mass of ICT professionals and knowledgeable workforce with leaders and talented employees for Government service delivery efficiency. This is to be supported by a valued talent management for supporting a culture of leadership and continuous learning through ICTs.*

*The Government intends to ensure the strategic alignment and integration of this HCD Plan into Government workforce planning with enhanced diversified civil service workforce through partnerships. Ultimately, the expected efficiency and effectiveness of government services will be backed by standards of accountability through monitoring and evaluation.*

*This HCD Plan comes at a time when the implementation of the NDP is making the Government ministries and institutions undergo significant organizational changes. The defined goals and strategies will ensure that Government employees and personnel have the ability to attract, manage, develop, and retain the best workforce to meet the changing governance needs. The expected alignment is to create a flexible governance framework that is responsive to the changing needs.*

*The implementation plan that is designed for this strategy is equally responsive to any future Government changes and or needs. The defined management and governance structures are to ensure that decision-making processes are transparent and that the strategy is effectively implemented. Wit MOICI being mainly responsible for its implementation in coordination with other ministries, significant roles for the ICT Agency and the PMO are emphatically emphasised.*

*The special committee and instruments that are to be used or relied upon for its implementation all reflect the value attach to the very objectives of this strategy. The unique reporting plan as well as the workforce plan of this strategy all make it to stand out as pertinent to the achievement of the broader goals of the NDP.*

*As we set the pace for its implementation, the target is to deliver to The Gambian people a highly developed and responsive ICT human capital by 2024.*

*Mrs. Amie B NJIE  
Permanent Secretary  
Ministry of Information and Communication Infrastructure*

### **3. EXECUTIVE SUMMARY**

*This HCD Plan aims at securing rapid upgrading of human human capital and related resources in The Gambia especially on the part of the Government to exploit the unfolding ICT revolution to the country's economic advantage and to use it as an impetus to drive The Gambia on a path to becoming knowledge-based economy. The issues that are central in this HCD Plan cover the roles of the Governments, educational establishments and private enterprises in developing the technological and human resources capabilities in order to bring about, and support, greater use, and exploitation, of ICT for the country's economic development.*

*The Plan considers the issues of technological capability building with special reference to ICT, indicators for measuring the technology and ICT capability, and the means of its achievement, particularly with reference to human capital. The identified indicators are to serve as means to ensure the achievement of technological capability to a level sufficient to bring about an ICT-driven knowledge-based economy.*

*The very basis of the exercise was laid out as well as the process followed in the formulation of this strategic document. There are reflections of the objectives of the NDP as well as the relevance and motivation of human capital. Through this the Government's ultimate objects for human capital strategy were outlined. It is a result of a thorough consultative process with a careful consideration of the Government's desire to deliver citizen centric services for ensuring the provision of improved public services and information in ways that are more beneficial to Government's operational efficiency.*

*Each action plan has a given associated cost. It is as a result of the measures being taken by MOICI in the development of an ICT Master Plan for The Gambia. The recognized objectives (action plans/projects) in the HCD Plan are intended to promote the broad goals of the NDP. As the NDP is set for "good governance and accountability, social cohesion, and national reconciliation and a revitalized and transformed economy for the wellbeing of all Gambians", the objectives and defined activities are linked to the deliverables of the NDP.*

*In addition to the NDP and ICT4D Policies, this strategy is informed by many other strategic documents and the experiences based on earlier efforts in relation to human capital development. Due consideration was given to the motivating returns in having an effective and efficient framework .The goals and objectives identified would have positive transformative effects on governance and government service quality as the current application and adoption of ICTs in Government services would fundamentally change.*



*There is a consideration of the educational and technology gaps based on SWOT assessment. A list of the important findings is provided, and a pointer was made for the challenging gaps and prerequisites in the forms of making the right alignment of the government priorities and policies with the HCD Plan. These challenging gaps and defined prerequisites informed the vision and mission.*

*The vision is to have acquired and establish “a model of excellence, competitiveness, innovativeness and leadership in ICT human capital development that is responsive to the dictates of knowledge-based economy in a globalised information society. This is supported by the mission “to lead and support The Gambia through the development of a capable, dedicated and diverse ICT human capital through ICTs.”*

*The defined goals and strategic objectives are just the very basic needs for the initiation and or introduction of human capital development. The goals are as under:*

- a) Increasing the size of the IT staff within government and having them engaged on full time basis by reducing reliance on contractors for a number of Government service delivery;*
- b) Increased the level of the productivity of the ICT staff by direct investment into the workforce for its skilful utilisation of technology in order to achieve quality in Government service delivery;*

*The supporting objectives of goal (a) are:*

- a) Creating a critical mass of ICT professionals and knowledgeable workforce;*
- b) Develop leaders and talented employees at all levels to help achieve operational success*
- c) Talent management by maximizing employee talent through recruitment, outreach, hiring and retention;*
- d) Supports a culture of leadership and continuous learning through ICTs;*

*The supporting objectives of goal (b) are:*

- a) Strategic alignment and integration of HCD Plan into Government workforce planning*
- b) Enhance the diversity of civil service workforce through partnerships*
- c) The auditing and evaluation for achieving best practice standards*
- d) Having a results-oriented performance culture*
- e) Government in ICT skills acquisition for sustaining workforce needs*
- f) Ensuring accountability by monitoring and evaluation*

*Based on the mapping, issues of risks management and mitigation strategies are considered followed by the crucial issue of funding. This is because the budget*

considered for this strategy is determined at an estimated total of **D60,300,000 (Sixty Million Three Hundred Thousand Dalasis)** in terms of programs to set up the framework. This excludes the cost of the administration by MOICI and the coordination by ICT Agency. The first goal attracts an estimated cost of **D10,500,000 (Ten Million Five Hundred Thousand Dalasis)** whereas the second goal attracts an estimated cost of **D49,800,000 (Forty-Nine Million Eight Hundred Thousand Dalasis)**.

The strategic framework for HCD Plan's implementation is created to facilitate coordination and accountability. The key stakeholders have been identified mainly MOICI, PMO, ICT Agency, MOHERST and the UTG with some committee formation approach.

This Strategy too adopts the traditional project financing approach where the entire project is funded through Government budgetary resources. Other funding measures like the use of private sector members, LGAs, donors, citizens and the use of the training levy have been outlined.

In order to achieve the goals and objectives of this Strategy there will be a coherent and steady monitoring and evaluation of the outcome indicators with special arrangements for the initiation of annual workforce plans. There will be annual review of the strategy's implementation and a full review at the end of the fourth (4th) year.

#### 4. INTRODUCTION

One of the key factors affecting the expansion of ICT and the realization of macroeconomic outcomes for investments in ICTs is human capital. Generally, a shortage of technologically skilled ICT workers impacts on the manner and way a country adopts, implements, innovates and maintains the new or emerging information technologies. For this reason, there is a challenge to formulate and implement complementary practices to investments in ICT human capital development strategies. As the focus is usually on investment, the critical strategic question is the subject of investment – workforce size or workforce productivity.

Certainly, with the dynamism of the ICT labour market any process of assessing the investment imbalances in the supply and demand for skilled professionals can be problematic. As the sector grows together with its sweeping challenges, the pressure to find suitably qualified ICT professional to effectively deliver is within the priorities of MOICI. In fact major ICT projects such as the ECOWAN, National Broadband, the ACE Cable connectivity etc. and the impacts of the state of their utilization have all contributed to generating the demand and competition for these qualified professionals for the government and the sector.

MOICI recognizes human capital development as an important mainstay for a knowledge-based economy. This is based on the observation that the ‘law of increasing returns’ is applicable to knowledge, as knowledge begets knowledge. The skill based technological changes all point to a need for a new set of knowledge for existing job portfolios and new ones.

Accordingly, it was considered prudent to have a clearly defined strategy for the development of the right human capital within the domain of ICTs to enable the Government implement and achieve the objectives within the sectors. There is a continuous development and diffusion of ICTs through The Gambia’s economy and this is driving the need for adjusting skills and learning in the use of the emerging ICT technologies. These technologies are impacting on productivity.

With the consideration of the potential impacts, this HCD Plan provides a high-level overview of the issues affecting the ICT human capacity and strategies to address the future human capital needs of ICTs specifically for employment in both the Government of The Gambia and the country. Through this plan, the Government and related agencies will be better able to plan, develop and manage a qualified, satisfied and flexible ICT human capital and also provide rewarding career paths for ICT professionals in the country. This is expected to impact on the private sector human capital development.

As part of the best practice, in The Gambia's drive to successfully create a knowledge-based economy, there is a need for more emphasis to be directed to the accumulation of knowledge or information rather than on the traditional factors of production. Importantly, an ICT Master Plan for The Gambia is being developed within which many critical issue-areas are covered including broadband and cyber-security.

In trying to carve out and make this HCD Plan adequate and relevant, the key terms of "capability" and "capacity" as part of its bedrock are given appreciation. The meaning adopted for the term "capability" connotes the:

*"knowledge, experience, skills, abilities, behaviours and attitudes required to effectively perform a function or activity whereas the meaning adopted for the term "capacity" is the "number of employees required with particular capabilities".*

The two combined helps in the appreciation of the constituent elements of capacity. This HCD Plan adopts the OECD definition of the term "human capital" as:

*"the knowledge, skills, competences and other attributes embodied in individuals that are relevant to economic activity" and it is "an intangible asset with the capacity to enhance or support productivity, innovation, and employability".*

In relation to the ICTs, the human capital and its management would relate to the process of managing how people with ICT specialty are hired, developed, deployed, motivated, and retained. The emphasis would be on planning, analysis, and return on investment measurement for human capacities in ICTs with special focus on results and not merely processes. The other aspect is the importance of people to organizational success and the need to transform the way employees and organizations interact with the use of ICTs. The first critical asset considered by this HCD Plan are the Government employees and are in a way viewed as investments rather than as expenses.

Based on the above definition and its emphasis, this HCD Plan is conceived with that primary objective of implementing measures for maximizing the benefits of ICTs through skill upgrading and organizational changes in The Gambia. The HCD Plan has a number of outlined action plans with each given an associated cost estimate. The main root of the formulated objectives (action plans/projects)

could be found within the broad goals of the NDP, which is promoting the delivery of:

“good governance and accountability, social cohesion, and national reconciliation and a revitalized and transformed economy for the wellbeing of all Gambians”

There is a need for the right and relevant human capacity in the use and adoption of ICTs for increasing, enhancing and improving government revenue, employment, infrastructure access and usage, skills development, capacity building, e-business and confidence on the part of all stakeholders of an information society with knowledge based economy. The HCD Plan is to enhance the formation of a productive and sustainable knowledge-based economy. It covers areas where human capacity is critical for the achievement of the broad objectives of the Government in the ICT domain.

The development of The Gambia’s human capital for the ICTs also recognizes the need to align the HCD Plan with the main objectives of the Government for ICTs with the right workforce and other sectors of the economy. It further recognizes the type of leadership rewarding system based on performances and results. The competency gaps are to be addressed through a clear system of accountability.

In effect, the HDC Plan identifies the challenges, the critical needs in relation to the objectives and the defined measures in the form of action plans for a defined period. Real recognition is given to the best practices and activities that are doable and workable within the context of The Gambia with some of its intrinsic peculiarities. The objective is to ensure The Gambia’s human resources capability in ICT to a competitive level that is in line with world standards.

## 5. BACKGROUND

Immediately after the adoption of the ICT4D Policy based on the review of the NICI Policy and the adoption of the NDP, a range of policy options in terms of frameworks and strategies have been identified to improve the status of ICT and its adoption, utilization and application in the country. Equally, human capital development falls within the key socio-economic development policy objectives and priorities. The stated target is to “promote the development of the requisite human resource to meet the changing demands of the key sectors of the economy” and to “enhance the human resource development capacity of The Gambia in response to labour market needs” in relation to ICTs.

This includes the need to have this HCD Plan as it is a response to the shortage of relevant ICT professionals in the government and public workforce. The key objective is to prepare a ground for bolstering the existing workforce planning with special focus on ICT skills.

Accordingly, this is a four-year Strategic Plan for human capital development for The Gambia covering the period 2021 – 2024 (HCD Plan). The Gambia’s current ICT Master plan covers salient areas of National Broadband and Cyber security and specific thematic areas covering electronic government, technology-enabled education and STI development, agricultural development and modernization, private sector development & empowerment, technology-driven social and community services provision & delivery, youth and women development and empowerment. This HCD Plan is to be applied to these specific areas in terms of the capacity needs for the human resources in relation to the ICTs.

The HCD Plan takes into consideration the procedure in developing a human capital strategy by taking into consideration those stakeholders it is expected to impact on as they must co-create, support, own and monitor the strategy and its implementation. For this reason and in addition to others, the strategy is also built on four related major pillars, to wit:

- a) The assessment of the ICT capabilities that are in place with the focus directed at the core capabilities as to the matters on the ground that are distinct and that would strengthen the resolve to succeed in the governance process through ICTs. In this assessment the energy is directed at capabilities that have to be strengthened to create or result in a significant change within a given time frame.
- b) Secondly, there is that reflective consideration of MOICI’s capacity as a Government ministry in terms of its fitness for the purpose of

human capacity development (change) as it relates to developing and implementing human capacity in relation to the ICTs. The key focus here is to consider the human resources capacity, expertise and innovativeness of the staff of MOICI and the Government in terms of numbers, resourcefulness and administrative processes. The ultimate first focus is about the fitness of the current MOICI structure in terms of the efficiency of its administrative overhead within the challenges for The Gambia to move into a digital economy. The objectives of the second goal on improving the productive capacity are to address this constraint.

- c) Thirdly, the acquisition of the right leadership talent especially at the senior management level is considered. This centres around the tools needed for the senior management to actively play its role in delivering what is targeted in the broad policies – ICT4D and NDP. Again, the emphasis is placed on the creation of a pipeline of future leadership talent by identifying the critical future leadership roles and a mechanism to balance the talent with the functionalities.
- d) Lastly, as the support of the personnel is a deciding factor for the success of the HCD Plan, the strategy is to create change with impacts. There are to be measures for the staff of MOICI to articulate the basic tenets of the strategy with unquestionable support for the new direction of the organisation. A factor of relevance for this is the opportunities identified for the staff to succeed and grow, regardless of any background or circumstances.

This HCD Plan is accordingly informed by the current and future needs and priorities for human capacity in a converged, competitive communication/ICT environment as well as the creation of the readiness of the human resources function to meet the current and future challenges of the knowledge-based economy under creation in The Gambia. The HCD Plan carefully considers the needs of the human resource function as well as the administrative function for both the governance process and the adoption of ICTs. This is simply because the human resource function is mainly becoming more strategic as it supports for the achievement of the broad Government objectives.

Based on the considered factors, the focus is on the preparation and development of people to acquire the right and relevant ICT capacity and to enter and continue in the Government workforce in response to labour market's changing needs for ICTs. This includes all institutions for learning and skills development. A developed human capital would facilitate the achievement of the

objectives of the ICT4D Plan and the NDP especially in developing the knowledge-based economy. Such an economy is built on innovations to transform The Gambia's economy into a globally competitive one. In order for the country to have ability to create and benefit from knowledge-based economy it will highly depend on its human capital.

#### **4.1 The Process Developing the HCD Plan**

To get and cover the right issues for human capacity development, a number of extensive consultations with stakeholders including the government, government institutions, ICT sector players, civil society and the general public were conducted. The critical issues with the consultation relate to the current human capacity needs of The Gambia for it to optimally adopt and utilize ICTs. The inputs from the consultations inform the basis of the defined objectives of the HCD Plan.

Consultations with key government and industry stakeholders (especially at MOYS, the PSC, PMO, MoFEA, MOTC, GBOS, UTG, MOLRG, MOICI, GCCI, etc) revealed a lot of passion about ICT workforce issues and a strong impetus for improving ICT human capital. Some stakeholders presented ideas relating to having a more consistent approach to recruitment, learning and development of the ICT for the entire governance machinery. A central issue of ICT entry-level programs and ICT classification model and associated remuneration options have been part of the discussions.

Interesting for a finding is the Scheme of Service for ICT cadre within the civil service. This covers the professional and non-professional officers working within the ICT function of the Government of the Gambia. Its structure, coordination layout, objectives and functions have been duly considered in this HCD Plan.

As there is no specifically outlined and clear-cut policy on human capacity development for ICTs, the conducted activities relate to a careful review of the available literature covering a number of relevant documents pertaining to ICTs for The Gambia, the data on human resource development in terms of supply and demand and the commentaries from some of the key players. Extensive one-on-one discussions held with government officials, representatives from industry and other stakeholders were centered on scope. The outlined interventions are categorized into manageable actions for implementation purposes with an implementation and monitoring framework.

With the data collection and analysis that was undertaken, the resulting understanding of the internal and external factors in relation to matters of labour



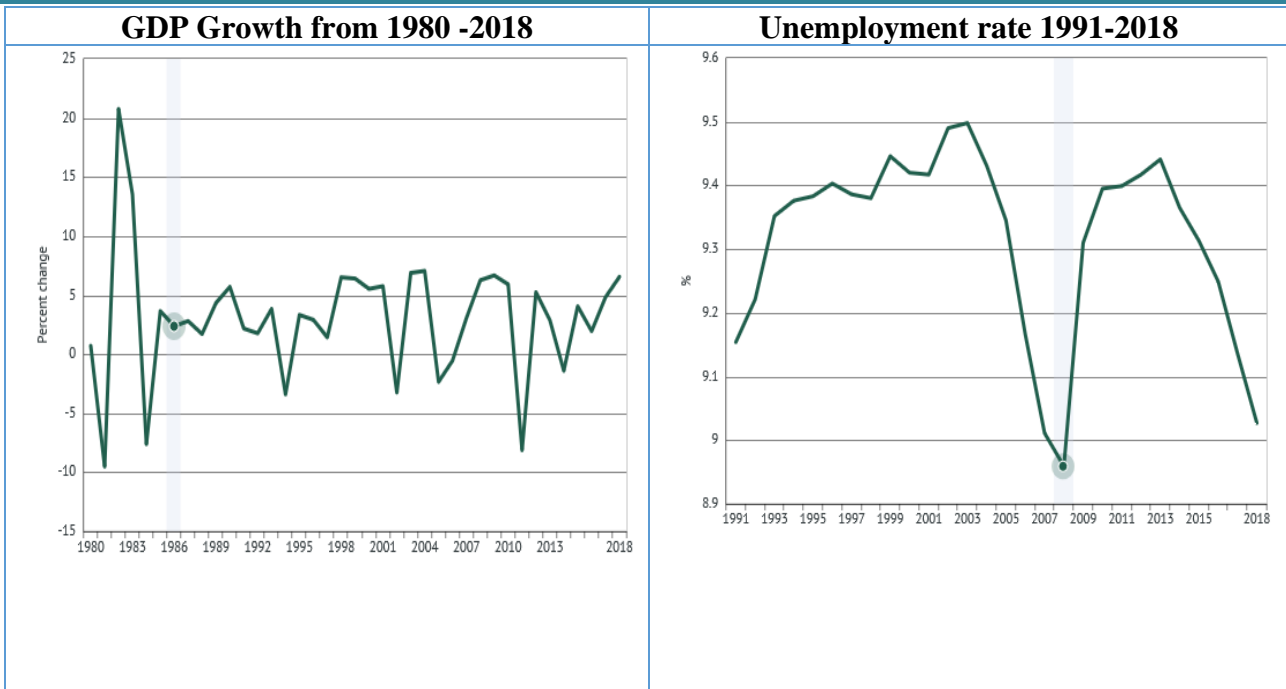
supply and demand and the identification of gaps in the ICT workforce inform this HCD Plan. In the course of the consultations, a special focus was put on the following;

<b>NO</b>	<b>ACTIVITY</b>	<b>SCOPE</b>
<b>A</b>	<b>INVENTORY</b>	Current knowledge and skills
		Current capacity
		Current work
<b>B</b>	<b>ASSESSMENT</b>	Performance appraisal
		Career plans
		Standard assessment tools
<b>C</b>	<b>FORECAST</b>	Projected work
		Projected gaps /needs
		Projected capacity

To appreciate the status of the above activities (tools, standards, knowledge and skills) the status of investment in education as a key determinant factor was considered. The special attention given to education by the government has some bearings on the current challenges including the rather low human capital development. The country’s GDP per capita is US\$:716 as of 2018. Based on the world bank statistics, the country’s total public expenditure on education as a share of total government expenditure was 10.3% in 2013. By 2018 Public spending on education, total (% of GDP) was reported at 2.4328. These are expenditures expressed as a percentage of total government expenditure for all sectors in a given financial year. The expenditure includes government spending on educational institutions (both public and private), education administration, and subsidies for private entities including students, households etc.

The Gambia’s current expenditure on education as a share of gross national income was 2.7(%) in 2018. This represents the total public current education expenditure expressed as a percentage of the GNI in a given financial year. This expenditure on education as a share of GNI of The Gambia increased from 1.4 % in 1999 to 2.7 % in 2018 growing at an average annual rate of 3.62%. This growth rate is very close to the country’s population growth rate as well. The table below depicts the real GDP growth from 1980 to 2018 as well as the unemployment rate from 1991 to 2018.

**The Gambia**



An important growth was registered in the internet users which grew substantially from 2.4 to 19.8 % rising at an increasing annual rate that reached a maximum of 37.87% in 2006 and then decreased to 7.22% in 2017. As a significant infrastructure for enhancing human capacity, this represents an opportunity for the Government.

#### 4.2 The Civil Service as a Key Area

The civil service is characterised by major capacity weaknesses. A lot needs to be done for matters of recruitment, retention and quality of service delivery. The advances in technology have since been exposing the serious gaps of civil service. In fact the civil service went through the restructuring of the pay and grading system of the for the period 2013-2014. This dates back to the 2007 when the PMO drafted a reform strategy document titled the “PSRSP 2007-2011.” There have been job insecurity and a challenge of institutional memory. There is the notion of piecemeal approach to reforms overshadowed by

*“over-expansion, patronage hirings, corruption, informality and an exodus of professional and technical skills. The politicization of the Public Service rather than rational bureaucracy created problems vastly affecting Government functions....”*

Even for an increase for the salaries was halted in those days as the Government expenditures on debt interest repayments was rather on a high side. The country is highly indebted and captured in the table below:

2019				
INDICATORS	SOLVENCY RATIOS		LIQUIDITY RATIOS	
	Present Value of Debt/GDP (%)	Present Value of Debt/Export (%)	Debt Service/Exports (%)	Debt Service/Revenue (%) (%)
External Debt Sustainability	40	180	15	18
Public Debt Sustainability	55			

Source: IMF/WB

With very low wages and salaries, some allowances and payments categories were introduced for a few and as the payments were not consolidated into basic pay, they do not form part of pension calculations at retirement. However, the current thinking, based on a consultancy report, is to have skilled and experienced personnel with capacity to design and implement programmes for improving the quality of public services. The need to push for a decent salary on a new grade system with the application of equal pay system. The consultancy report’s recommendations, some with incentives, are summarised as under:

- a) A Defined Government pay policy for adoption by the Cabinet;
- b) Pay scales to be attached to each of the proposed new grades;
- c) Salary levels to be progressively increased over a period of 3-5 years
- d) Progressive consolidation of allowances within pensionable salary that is have the effect that allowances that remain would no longer be a semi-disguised form of salary supplement
- e) Narrowing the gap in compensation packages between the public service, private and agency sectors;
- f) Improve the overall level of salaries for all civil servants to receive a decent living wage;
- g) Maintain the affordability of the overall civil service wage bill
- h) Ensure that the principle of equal pay for equal work to be applied across the civil servi;

- i) Improve the effective, efficient, responsive, accountable and transparent delivery of public goods and services to the people of The Gambia;

This is not yet fully implemented as the Government the World Bank on discussions to provide funding for a 2-3 year implementation. Relevant for this plan is the recommendation of the consultants for a work to be done in order to encourage greater autonomy in jobs in order to justify the academic qualifications required and that there should be a greater spread of responsibility for financial management.

### **4.3 The Basis and the Dimensions for HCD Plan's Development**

The crucial role of human capital development requires firm commitments, support and direction from the Government. The adoption of ICT in the public sector is inevitable in the light of the changing technology and huge investment by the government to turn electronic all aimed at improving efficiency and effectiveness of the public service.

The NDP and the ICT4D all promote the need for the Government to effectively use ICTs. Globally, the landscapes for public service delivery are changing because of the introduction of ICT- enabled processes compounded by the rapid change in ICT products and services commanding the need for learning new skills and processes. The use of ICT and other new technologies at the operational levels are for creating more productive and efficient workers.

The fact is that Government employees must require new skills as well as “the skill to acquire new skills” on a continuous basis. A core generic skill would be ICT skills that all employees must have together with other skills to perform multiple tasks. As for example, there is a fundamental increase in the use of IT in all aspects of public finance, budgeting, enforcement activities and inventory control.

Further, it is becoming clear that quality of Government service depends on employees' readiness with regard to ICT competence, satisfaction with ICT in terms of beliefs and attitudes about ICT, knowledge of ICT potential as well as work productivity impact of ICT and other technologies. Accordingly, these necessities, as they have become, are now pushing for enrolment in tertiary education especially in science and technical field because of the growing demand for new inventions and innovative products. The application of ICT as an enabling tool for governance cannot be overemphasised.

It is the case that countries and states with the right and relevant human capital are optimally reaping the benefits of ICTs in its adoption and application to service delivery and other productive sectors of the economy. The first considered approach to ICT adoption and application as outlined earlier is investment in ICTs. However, increase investment in ICT infrastructure alone do not result in proportional increase in revenue as multiple internal and external factors mediate this relationship. It is now proven fact that there is a need for complimentary investments in human capital for the realisation of the economic outcomes from ICTs (technology) investment.

This HCD Plan considers two broad goals for ICT related human capacity development, to wit:

- a) Measures for increasing the size of the ICT staff (MOICI, Government and Country);
- b) Measures for increasing the level of the productivity of the ICT staff (MOICI, Government and Country);

The overall rationale is, among others, to help Government and its agencies effectively manage their ICT workforce into the future. The Government and its agencies will gain the knowledge they need to effectively plan their current and future workforce and capacity and position civil servants for their career paths of choice through ICTs. With the right human capital, useful resources and information will be made available to assist with planning a satisfying ICT career in the civil service and provide opportunities for better managing the learning and development needs.

However, in the HCD Plan the consideration is on the possibilities of the targeted increase in the size of the ICT staff in terms of having full time ICT staff and or placing a degree of reliance on contractors. The broader objective being the move must have positive impact on the macroeconomic outcome.

On the dimension of increasing the level of the productivity of the ICT staff, the consideration is on investment in the workforce and or investment in the technology. This boils down to the challenge of quality of technology and its skilful utilisation. The table below summarizes the basis and dimensions of human capital development for ICTs.

NO	DIMENSIONS	IMPACT AREA	STRATEGY
a)	Increasing the size of the ICT staff	Workforce	<ul style="list-style-type: none"> <li>i. Engaging full time ICT staff</li> <li>ii. Relying on contractors</li> </ul>

b)	Increasing the level of the productivity of the ICT staff	Investment	i. Investment in the workforce – skilful utilisation of technology ii. Investment in the ICTS (technology) – for quality
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Another area that also impacts on the dimensions considered by this HCD Plan is its realisation of the value in the interrelation of the continuous innovation, human resource management and ITCs.

#### 4.4 The Education Policy and the Dimensions

The considerations of increasing the size of the ICT staff and the level of the productivity of the ICT staff is complimentary to the goals set out in the national and sector development policies (ESP 2016 – 2030) for human capacity through education. Human capital development in the form of human resources is one of the six priorities of Vision 2020. The recognition is to substantially raise the education and skill levels of the population at large to raise the productivity in the various sectors as the country prepares the ground for adoption and development of new technologies. There is the implementation of PAGE with a key consideration of strengthening human capital access to quality education. Even the SDGs could be relied upon for enhancing size and productivity. The ESP 2016 - 2030 targets the expansion of education and training opportunities as well as improving the quality of education and training at all levels.

The right type of human capacity in terms of training and fitness for purpose have the potential to impact on all forms of strategies for ICTs. This HCD Plan is weaved to provide solutions to the needs of The Gambia in its implementation of the ICT Master Plan. The key statistics relating to the technology and human capacity all inform this strategy.

#### 4.5 Compelling Statistics

It is important to start with the contributions of ICT (communications) to the GDP as one considers this HCD Plan. As the service sector contributes a factor of 63% (15,226,950) to GDP the by 2018 and within this telecommunication alone stands at 12.57% (by Q1 of 2018) with an annual growth rate of 9.3%. There is a mobile penetration rate of 153/100, a fixed line penetration of 2.2/100, broadband penetration of 26% with at least 541,755 3G subscribers as of the first quarter of 2018. All this is within a population with an annual population growth rate of 3.5%

since 2013. This represents a partly developed infrastructure for the Government to adequately use ICTs in its governance process.

Based on the UNDP data under the classifications of human development index of high, medium and low as per UNDP HDR-2019 Report The Gambia falls within the “low category”. Consideration is given to the public expenditure on education as a whole as a percentage of GDP, and on secondary and tertiary education as a percentage of the total education budget for all levels of education.

As per the said UNDP Report, inequality fell in The Gambia as the incomes of the bottom 40 percent grew between 60–80 percentage points more than the average. The country has an HDI of 0.466 giving it the rank of 174. It must be said that the Gambia’s HDI ranking was 178 in 2017 and this improved to 174 in 2019 representing an average annual HDI growth of 1.26. While the life expectancy at birth is 61.7 years, the life expectancy at birth for female is 63.2 and male is 60.4. The country’s gender development index in 2018 was 0.832 with female being 0.416 and male being 0.500.

Based on the same Report 12.3% of the labour force is skilled labour force and there is labour force participation rate of 51.7% for female and 67.7% for male. The female share of employment in senior and middle management from 2010 to 2018 is 33.7%. With a gross national income per capita of US\$1,490 the level of inequality in education in 2018 was 49.3%. The expected years of schooling being 9.5 and mean years of schooling 3.7.

The share of the graduates in science, technology, engineering and mathematical programmes at tertiary level, female 53.1 and the share of the graduates from science, technology, engineering and mathematical programmes in tertiary education who are female is 45.7. The population with at least secondary education from 25 years above is 30.7% for female and 43.6% for male.

While 0.1% of GDP is for research and development expenditure, 1.1% of the same GDP is on military expenditure. The ratio of education and health expenditure to military expenditure is 4.9% between 2010 to 2016.

Further, the national poverty line is 48.6 and the percentage of the population that is vulnerable to multidimensional poverty is 34.4. The overall percentage of the population living below income poverty line of \$1.99 a day 10.1%.

For want of specificity, the expected years of schooling are “the number of years during which a 2-year-old child can expect to spend in schooling, based

on the school enrolment rates at a given date”. The mean years of schooling provides the average number of completed years of education of a country's adult population (25 years and older), excluding years spent repeating individual grades. In the case of The Gambia 9.5 years of schooling and 3.7 mean years of schooling represent a real challenge of capacity. In effect, with the related challenge of serious gaps in education, skills and the status of women, the share of seats held by women in parliament is 10.3% in 2018.

Education Sector Strategic Plan 2016 – 2030 is designed to ensure accessible, equitable and inclusive quality education for sustainable development in The Gambia. In the table below the evolution of the total and school aged population for the last three census periods and projections to 2030 is captured. The population of children in Basic Education (7-15 years) increased annually by 2.8 percent from 320,646 in 2003 to 411,575 in 2013. The overall population growth rate is 3.2 percent.

	1993 Census		2003 Census		2013 census		2020 projection		2030 projection	
	Total	%	Total	%	Total	%	Total	%	Total	%
Total population	1038145	100	1360681	100	1857181	100	2308994	100	3151524	100
3-6 years	150862	15	178322	13	211624	11	238570	10	283124	9
7-12 years	170522	16	224770	17	283290	15	333101	14	419825	13
13-15 years	71632	7	95876	7	128285	7	157297	7	210481	7
7 – 15 years	242154	23	320646	24	411575	22	490398	21	630306	20
16-18 years	64734	6	86319	6	119319	6	149669	6	206887	7
Subtotal	457750	44	585287	43	742518	40	878637	38	1120317	36

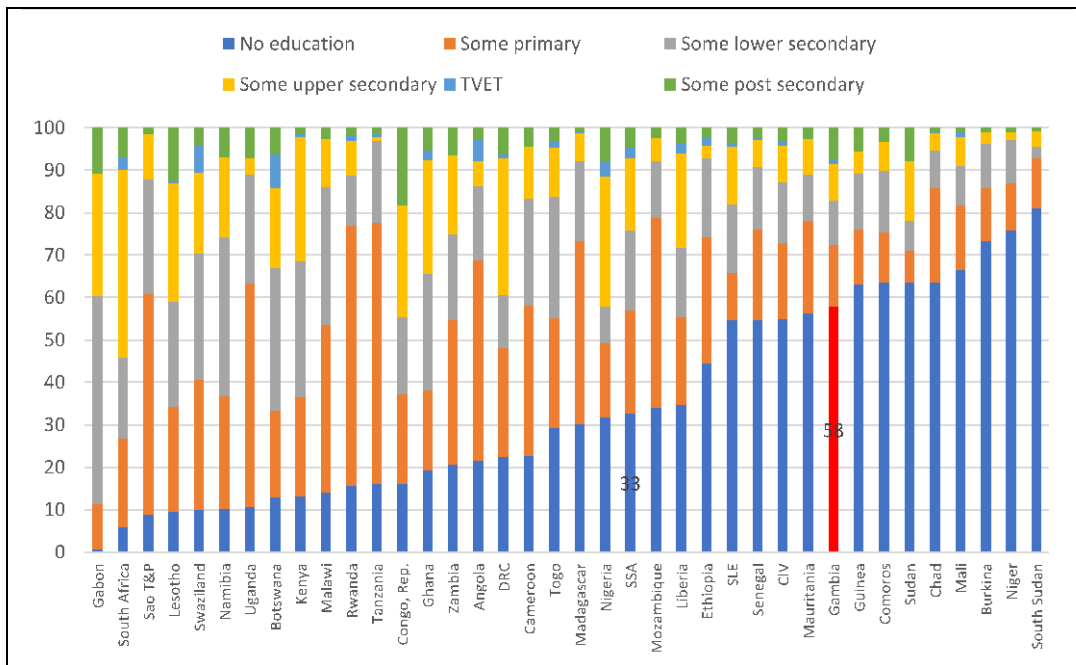
#### 4.6 Key Issues Revealed by the Statistics

As the issues of investments in the workforce (for skilful utilisation of technology) and in the ICTS (technology for quality of Government service) become relevant within the plan, due consideration is given to the public sector matters. This is because the public sector is an important provider of higher and tertiary education dominated by the UTG, GC, GTTI and MDI. With an achieved UPE the quality of education is rather low. Measures for improving quality in terms of content of educational materials, the supervision, monitoring and evaluation of policy implementation across the system need to be accelerated. In effect, there is a need to align the skill mix with the current challenging needs. There is the critical issue of limited financing for the education sector with impacts on capacity and quality. The objective on talent management through recruitment, outreach, hiring and retention as addressed at objective point **9.3.3** is to cater for this challenge.

The education policy and strategy recognized The Gambia as a country with one of the the lowest educational attainment levels in sub-Saharan Africa. By 2015,



about 58 percent of the population have never been to school compared to the sub-Saharan Africa average of 33 percent. This represents a distribution of the adult population, by highest education level attained - The Gambia compared to the Sub-Saharan Africa average in percentage terms as wholly captured by the table below;



Source -Integrated Household Survey 2015/2016 of GBOS

For the purposes of creating a skilful workforce the country's adult literacy rate and youth literacy rates are important to consider. A key challenge is how to generate increased growth in the education sector and make The Gambia competitive. Based on the most recent statistics of GBOS, by 2015, only 56 percent of adult Gambians were literate compared to 61 percent in sub-Saharan Africa. As pointed out earlier, the adult literacy rate of men 64% which is the same as that of the sub-Saharan Africa percentage (64%). The female adult literacy rate 48% percent compared to sub-Saharan Africa average of 53%. The country's male youth literacy rate was 76% slightly below the sub-Saharan Africa average of 77 percent.

On the matter of the workforce for engaging full time ICT staff, wage employment factor is important to outline. The wage employment in The Gambia is relatively low at 27% of total employment which is higher than the sub-Saharan Average of 24%. The remaining 73 percent of the country's labor force outside wage employment splits almost evenly between non-wage non-farming 34 percent and

farming 39 percent. The wage employment increases with the level of education attained from 16% for those with LBE to 85 percent for graduates of higher education.

As the need for the productivity of the ICT staff through investment in the workforce is strategic, there is the challenge of inadequate and poor infrastructure, insufficient number of trained teachers for STEM impacting on the students' negative attitudes towards Mathematics and Science. The education policy and strategy all recognize the importance of STEM as a pre-requisite for skills development, innovation, creativity, entrepreneurship and employability. Through policy, the efforts are geared towards having strong science, technology, engineering and mathematics education commencing at the basic and secondary level to the development of an in-country based research scientists, technologists and engineers at tertiary and higher education level. Further, there is the recognition of EBS that is being provided to support teaching/learning processes both in and out of the school setting as well as TVET in order to create self-employable opportunities.

At this stage it is important to restate an important activity within the education policy and strategy which is the measures being considered for a:

*“gradual paradigm shift from teacher-centered and textbook based teaching towards interactive learner-centered approach that will include digitalizing teaching and learning materials across all levels and types”.*

The issue of access and use of the internet for teaching and learning (e-learning) with the adoption of a number of partnerships are being considered. This is to be extended to adult and NFE programmes.

#### **4.7 The Focus on Secondary and Tertiary Sectors**

To understand the needs of human capital development, the HCD Plan considers the three economic sectors to wit:

- a) Primary sector that pertains to agriculture;
- b) Secondary sector pertaining to industry;
- c) Tertiary sector relating to information processing as output, e.g. in administration of government, banking, finance, medical care, wholesale and retail trade, education, etc.;

Certainly, the two sectors that are directly pertinent to ICT development are the secondary and tertiary sectors. This HCD Plan for strategic reasons promotes them more from the beginning for the following reasons:

- a) The two practically rely on knowledge conveyed through education, training and internationally standardized techniques. They do not uniquely rely on knowledge passed down from generation to generation and any specialized knowledge provided by various ministries, departments, agencies and institutions as in the primary sector.
- b) Further, in the secondary and tertiary sectors the employment criteria are usually shifted to skills rather than on family or social connections as can be the case in the primary sector;
- c) Equally, unlike in the primary sector, the technological capability in the secondary sector is task-specific;

In consideration of the above, the defined objectives of creating a critical mass of ICT professionals and knowledgeable workforce and the development of leaders and talented employees at all levels (at **9.3.1** and **9.3.2** respectively) are to promote and achieve the above strategic reasoning.

#### **4.8 Observed Best Practices**

A consideration of the practices of Singapore, Costa Rica and Botswana were made. Based on its size and demographic limitations, Singapore embarked on a rapid programme of education, raising itself from a low scientific base to a nation with a highly skilled workforce. It diversified into more and more skill-intensive industries such as electronics and computing hardware, thus creating a virtuous cycle of knowledge and technology transfer and further foreign investments. It later moves towards R&D activities, each time consolidating its achievements with frontier technologies. This has been complemented with diversification of the economy into other areas, notably into finance and other service sectors. The objective pertaining to the creation of critical mass of ICT professionals with a number of action plans is informed by this Singapore experience.

Equally, Costa Rica was until recently known for its production of coffee beans and bananas, it has now become another success story in Latin America through the planned diversification of its economy. It is now exporting more Intel microchips than coffee or banana. Its human capital development programme included actions such as introduction of computing to school curriculum,

introduction of innovative learning techniques with the help of non-profit foundations like Omar Dengo Foundation set up in 1987. Its technological institute was turned into a premier ICT school. The objective **9.3.2** on the idea of developing leaders and talented employees at all levels is informed by this experience of Costa Rica.

In the beginning Costa Rica university was mainly to promote innovation and scientific advancements and the commitment to professionalism in production processes is demonstrated by actions such as the formation of a program for the improvement of the software sector. Its Government is making good use of fiscal policies to promote ICT and it even reallocated funds from defense to education. It has taken the initiative to use ICT to improve its own services. It has reduced taxes on computers and introduced incentives to attract foreign companies through free trade zones, going as far as introducing electronics. The objective as in **9.4.5** on Government in ICT skills acquisition for sustaining workforce needs is informed by this practice.

Even in the case of Botswana, in its policy, science and technology is considered as critical to productivity growth, national competitiveness and the diversification of the economy. The human capacity development puts emphasis in the area of post graduate studies and leadership development as well as entrepreneurial development through ICTs. Its tertiary education is premised on the theme “Towards a Knowledge Society’ by considering measures for responding to the rapidly changing social and economic trends with policy challenges on matters of reforms for balancing human capacity needs with the strategies. So the corresponding strategy for human capacity development focus on building a society that prioritizes human resource development with people placed at the centre of national development strategies. A special council was created for human capacity development. The objective **9.3.4** supports a culture of leadership and continuous learning through ICTs.

#### **4.9 The HCD Plan in Relation to the NDP and ICT4 Development**

This HCD Plan is also informed by the vision behind the NDP. It is all about the creation of knowledge-based economy and the effective adoption and utilization of ICTs by the Government, the businesses and the citizens. The Government would be obliged to consider and address a number of policy and regulatory issues, matters of investment and create the right incentives for ICTs to be turned into effective governance tool.

Equally, the critical issues of infrastructure, the right content, standards and consumer protection would all require the constant vigilance and management of

the Government. None of these could be addressed if the right and relevant human capacity is missing. The Government through its employees, the businesses through policy enhancements and the citizens through the right environment for ICT capacity building would all need some forms of human capital (specific ICT knowledge) development.

Further, the key priority areas of the ICT4D Policy covers the facilitation of socio-economic growth and development of the country by deploying appropriate ICT systems and solutions, achieving good governance and transparent government through ICT, the strengthening of the country's global competitiveness and the promotion of private sector development and the enhancement of the ability of citizens to utilize ICT in their conduct of various business activities through new skills under special human capital development. Each of these specific objectives of the ICT4D Policy equally informs this HCD Plan.

## **6. CURRENT GAPS, CAPABILITY INDICATORS AND RELATED FINDINGS**

Based on a SWOT consideration, in developing human capital around ICT two core issues are considered and these are:

- a) The level of reliance on ICT applications for efficiency gains;
- b) The level of the production of ICT goods and services for the internal market and export;

There is a limited adoption and use of ICT applications in industry, commerce, agriculture and public administration in The Gambia. This could be seen in the very levels of efficiencies in the current quality of service in areas such as health, education, service delivery in the utilities etc.

This HCD Plan considers measures for exploiting the competent use of ICT Applications as a vehicle for economic development especially through software development and assembly and manufacturing of computing equipment and components. None of these could be achieved without addressing the gaps.

There are a number of gaps that are being addressed by this HCD Plan.

### **5.1 The Gaps in Knowledge**

Comparatively there are knowledge gaps and challenges pertaining to information. The vast difference in the levels of the technical knowledge and its constant changes all would make it a rather ineffective exercise for The Gambia to go through the same processes of learning, discovery and innovation.

It is so real that now many services in our society are becoming digitalized (with mobile operators with platforms like banking, broadcasting etc.) and there is that need for issues of access and use of information and communication products and services (ICTs) to be enhanced. All members of the workforce must be facilitated fully to be able to take part in information society being created. In addressing these gaps, the ICTs (services, tools, networks etc.) should be designed in such a way that they are usable and accessible to all. Therefore, the challenge is to define a basic level of usable and accessible ICT features for capacity and to increase qualified ICT practitioners and e-skilled managers within the E-Government ecosystem to be created and enhanced.

### **5.2 The Gaps in Technology**

Currently the gaps in technology are also impacting on the level of human capital development in The Gambia as well as ICT utilization. Even the available technologies are difficult to optimally utilize because of the inextricable link they have with the level of technical knowledge (capacity).

As partly outlined in the strategy for STI the dimensions shaping the dynamics of technology are being informed by the available knowledge stock which is gradually growing. The key factors that influence this growth include the intensity of innovation, the infrastructure for technology and the human capital. As part of the major gaps, infrastructure and human capital do determine and will continue to determine The Gambia's absorptive capacity and innovative ability.

There is now growing reliance on ICT applications for efficiency gains and some attempts are being made for the production of ICT goods including software for The Gambia's internal market and export. It is observed that the use of ICT applications in industry, commerce, agriculture and public administration would surely bring about significant efficiencies, improved quality of service in areas such as health, education, better quality of life for citizens and also breed invaluable market opportunities for the country's entrepreneurs in terms of new businesses and employment generation. A clear manifestation of need for such changes is representative of the country's global ranking of 155 in terms of ease of doing business. Based on best practices, another gainful way of exploiting ICT for economic development is to invest in the production of ICT goods such as software development, the assembling and manufacturing of computing equipment and components.

The question of limited human capital present challenging gaps for even ensuring the competent use of ICT applications and the production of ICT goods. There is a need for careful planning to enhance capacity and capability by upgrading the ICT workforce to the necessary professional standard in order to quickly and effectively respond to this interesting emerging demand.

Generally there is a shortage of strategic skills and competencies facing the country's ICT sector today. As for the Government, the issue of a shortage of managerial skills in a competitive changing environment that is accelerated convergence is quite challenging. There is a constant need for changes in policy and regulations. The new services that are constantly being introduced expose a number of weaknesses. Further, the need for a balanced innovation and creativity in Government services as well as ICT applications for enhancing Government service delivery are all very challenging.

The current ICT skills gaps especially for the effective implementation of e-Government objectives and the development of the information society all require some special attention. The Government employees need skills for Government's utilization of NGN. A need for a comprehensive policy and regulation for a converged environment and a capacity on the part of the government employees for the implementation those policies and regulations.

Lastly, the non-existence of a clearly established national mechanism for supporting the development and implementation of a long-term and consistent ICT skills agenda in close cooperation between the public and private sectors also call for a careful consideration. These challenges are to be addressed once the objectives of this HCD Plan are realized.

### **5.3 Indicators for Technological Capability**

As there is a limitation in the level of technology capability (this means the knowledge, experience, skills and abilities), the current indicators for the overall technology capability all point to a need for strategic actions for enhancement of human capital development. Being guided by the statistical data from international organizations like the UNDP and the World Bank, the HCD Plan considers the following indicators to be able to understand and plan for the human capital development.

- a) Specifically, the HDI is considered as it factors the basic dimensions of basic human development as captured by life expectancy, knowledge as captured by literacy rate, the enrolment rates of students to primary, secondary and tertiary educational institutions and the standard of life as captured by the GDP;
- b) Broadly, four other important indicator categories are considered, to wit:
  - i. ICT infrastructure (Internet penetration, telephone usage, per capita IT hardware expenditure, per capita software expenditure, per capita telecommunication investment, number of PCs used at home per 1 thousand people);
  - ii. Human capital (per capita expenditure on public education, competitive educational index: appropriateness of educational system for a competitive economy based on a survey);



- iii. Innovation (R&D personnel per 1000 people, per capita R&D expenditure, patent productivity per 1000 R&D personnel);
- iv. Productivity (labour, industry, human skills development, service, overall electricity consumption);

To simplify and cater for the gaps in technology, the HCD Plan considers the three essential aspects of technological capability, to wit:

- a) The ability of Government staff to understand technical processes, acquire the knowledge about them, interpret and adapt it to suit the local conditions and apply it creatively to the solution of practical industrial problems;
- b) An institutional character relating to the existence of certain specific institutions that enables the integration of technical knowledge possessed by the society as a whole into a coherent framework and thus its application in a complementary and productive manner for the benefit of the society as a whole;
- c) The societal value of technological capability is factored and based on common purpose shared by the society;

#### **5.4 The Indicators for the Human Capital**

The skills base of the current workforce, be it for the Government or the private sector, is the most basic factor that determines the success and or the failure, of any industry, including ICT, and hence its impact on the economy. The human capital indicators reflect the educational attainment at an aggregate national level, the actual skills and competences accomplished at the point of completion of studies, personal motivation and commitment of individuals. The widely used human capital indicators for measuring the attainment levels of the current working population are considered, and these are: <sup>[1]</sup><sub>SEP</sub>

- a) Percentage of the working adult population (age group of 25- 64) to have successfully completed a given level of education (e.g. secondary, upper-secondary, tertiary, etc. based on internationally agreed measure by the ISCED);
- b) Years spent on education at, or up to, a given level

## 5.5 The Information Challenge

Based on the above indicators, there is a need for a lot of information that must be generated, analyzed, synthesized and managed locally in a form beneficial to The Gambia. Currently, there are deficiencies in information and this could hinder human capacity development. This is a challenge in itself as this sort of information relate to the following:

- a) Market information especially on costs, prices and suppliers of products and services; [L]  
[SEP]
- b) Research, development and experiential information in relation to new ICT services and facilities, new products, techniques, achievements [L] and failures etc. for the good of the public, the economy and professional scrutiny; [SEP]
- c) Regulatory and normative information on standards, norms and good-practice;
- d) Performance information pertaining to measurements or observations on actual quality of products and services or actual performance levels of institutions and industries;

## 7. THE MAJOR CHALLENGES & PREREQUISITES

In addition to information deficit there are other compounding challenges. The Gambia's size and its geopolitical location make the country's economy vulnerable to external shocks especially this Covid -19 that is taking its toll on the economy. There is serious public debt and this alone is a challenge to any policy measure that require special budgeting and or funding. The current challenges informed this strategy in becoming a demand driven one. Based on the statistics and the ground realities the challenges exist in both the supply of and demand for knowledge and skills (labour market) that are required by industry in order to enhance inclusive growth and sustainable development.

Using the data within UNDP Development Report, the UNESCO, PURA and GBOS, The Gambia's expenditure on education as percentage of GDP lie close to 20% and in tertiary education it is below 20%. These data clearly indicate that the expenditure on education is low in comparison to many. The adult literacy rate is still less than 60%. The part of the GDP that is to be put aside for R&D as per the AU is 1% but this is yet to be done. The following areas need some special attention.

### 6.1 MOICI in Office - Needs the Light to "Power" the Sector

Among other things, MOICI is saddled with the responsibility of coordinating capacity issues and implementation mechanisms for activities within ICT sector. However, MOICI as the sector ministry has its own human capital challenges. The sector that it is representing is contributing most to the national budget but MOICI continues to have one of the lowest Government budget allocations. This is happening at a time when the Government must, just like a number of the ECOWAS countries, actively adopt e-Government initiatives to reduce the cost governance and enhance developments in other sectors. The related activities to be performed by MOICI cannot be achieved with the common figures of its current budget. As a standard practice, one of the most expensive initiative in ICTs is the continuous need to monitor and evaluate ICT sector capacity and projects but this is rather compromised because of MOICI's current limitations which are no fault of its management.

The current policy positioning on a number of satellite institutions under MOICI negate its capacity to have effective and measurable control over its satellite institutions especially where some approved strategic institutional objectives are to be implemented. As for example MOICI has the greatest interest in institutions like Gamtel and PURA but the same institutions have their budgeting strategies being determined by other institutions. In today's challenges pose by technology

and globalisation, MOICI's current capacity to freely spearhead and address the sector needs is being impeded by its budgetary limitations and the current Government set-up as far as the institutional framework for ICTs development is concern. This HCD Plan is to change that status que especially through its objectives more specifically under goal (a).

## 6.2 Technical Education

An important part of the relevant statistics is on tertiary education which is geared toward producing more graduates in non-technical subjects (humanities, education, social sciences, business and law) than in technical subjects. The implication is that not producing enough graduates as required for a knowledge-based economy, even for using ICT for efficiency purposes, is a major challenge that ought to be addressed by any human capital strategy.

The investment in education and the student enrolment pattern in technical education need to be adjusted for the human capital part of public sector to be addressed with satisfaction. The recognition is for major efforts to bring innovation, research and development in the areas of technical subjects.

## 6.3 Educational Qualifications & Unemployment Constraints

There are key concerns facing the country and this begins with high youth unemployment even amongst those with university level qualifications. A number of the general qualifications do not march with what the market truly would require. Secondly, a large number of the youth have very limited or no skills especially those that matter for the knowledge economy.

## 6.4 The TVET

As part of the current best practice in nearly all African countries there have been measures that are put in place for the development of relevant qualifications, through the TVET system, for middle-level occupations such as technicians. The very purpose of the TVET is to equip those interested and eligible Gambians with the technical and professional skills needed for socioeconomic and industrial development of the country as the emphasis is on training the said people for self-employment. It was within the NEP-2004 – 2015 that was advocating for the strengthening, expansion and diversification of TVET programmes in order to meet the emerging needs of the growing labour market. The PAGE-2012-2015 replaces the PRSP-2007-2011 provided for capacity building initiatives such as TVET programmes with a requirement of having them linked to job market requirements.

Even though it has a legislative backing of the NTA Act 2002, a subsequent NAQAA as a replacement and 83 licensed and accredited TVET providers in the country, the TVET programme has setbacks. The available TVET system faces the constraint of financing (Government's limited annual subvention) and a lack of a credible PPP. With it being considered as costly by the government, it is looking into the possibilities of having a sustainable financing scheme.

There is a further challenge of placing its practical governance framework under three different ministries (MOBSE, MOHERST) and MOTIE), some of which also simultaneously oversee many other training institutions

#### 6.5 Competence Challenge for GSQF Framework

It is noted with concern that THE GSQF that came into effect in 2002 under the then NTA with the objective of "reflecting the skill standards needed to support human resource development across all economic sectors" and to provide "standards that can support initial and continuous vocational training including learners with low literacy levels" has since started having serious issues in the forms of competence, resources and relevance in view of the replaced NTA Act.

#### 6.6 Quality of Higher Education & Wage Disparity

The country's statistics as revealed by the UNDP HDR 2019 point to the need special for focus to be given to the measure of the quality of higher education and training systems in order to gain a better global competitiveness status. There is that need to develop and move move up the value chain beyond simple production processes and products.

The large wage disparity amongst the private sector workers as well as between the private sector workers and Government workers is seriously concerning.

#### 6.7 Strategy Backed by a Comprehensive Policy

Further, the ICT4D Policy has within it policy statements on human capital. However, a mere policy statements and this HCD Plan may not be enough. There is a need for developing or having a revised HCD Policy to accompany this strategy. The HCD Policy is to cater for an all encompassing overarching framework that must be designed to support, guide and sustain the implementation of this strategy. It would be more of a concrete measure for The Gambia in holistically approaching the development of human capital.

## 6.8 The Basic Prerequisites for HCD Plan's Successful Implementation

Fundamentally, the Government is committed to conduct training, adopt the best practices, initiate Government employee development and view training in ICT domains as investment rather than a cost. The readiness is to address or have the following addressed by the concerned stakeholders;

- a) Creating an advanced communication and technological infrastructure for Government service delivery;
- b) An appropriate institutional infrastructure to support ICT technological capability and protect IPR and patents;
- c) Having in place an adopted framework for human capital through education at all levels, especially in ICT and technological disciplines and training;
- d) A clear framework for the promotion of innovation and R&D activities both within academia and industry;
- e) The need for national commitment bound by a 'common purpose' and inspired by a visionary leadership;
- f) Coordinated action on capability building with the full involvement of government, industry and academia;

## **8. OPPORTUNITIES**

### **7.1 The Baseline Objectives for Human Capital Development**

In the creation of a knowledge-based economy there must be the right and relevant personnel with the ICT knowledge in all areas marked out by the Government. These personnel must be well retained and must exhibit dedication and hard work for the achievement of the objectives of the Government. There must be measures in place for a continuous development of skills of all employees in a constantly changing ICT environment. The right environment must be created for the Government to enhance innovation in its use of ICTs. The environment is to aid in the acquisition of new competencies, skills, and attitudes to the utilization of ICTs for the realization of the objectives.

The creation of the right environment, the fundamental objectives relate to the creation of the right environment for the right and relevant human resources that would be used in achieving the objectives of the Government for both governance and the ICT sector of The Gambia's economy. As for example, in order to achieve 95% digital literacy in schools and 80% digital literacy amongst the Government's workforce, the right and relevant human capital must be created.

### **7.2 Targets Based on International Commitments**

There are some interesting targets sets and they all point to the need for a proper human capital development. These targets are partly informed by the commitments at the international level especially the ITU. The commitment is to have the following;

- a) The broadband-Internet user penetration to reach 75% worldwide, 65% in developing countries and 35% in least developed countries;
- b) That 60% of youth and adults should have achieved at least a minimum level of proficiency in sustainable digital skills;
- c) That 40% of the world's population should be using digital financial services;
- d) Reducing the un-connectedness of micro, small and medium-sized enterprises by 50%, by sector;
- e) That gender equality should be achieved across all targets.

As part of the broadband strategy the following also provide similar opportunities:

- f) By 2022, at least 75% of homes should have affordable access to actual download and upload speeds of at least 5 Mbps; and by 2023, almost 100% of home should have affordable access to actual download of 5 Mbps and an increase access to broadband coverage of 4G to not less than 85% of the population by 2024;
- g) The Gambia should become a leader and pacesetter in the region in mobile innovation, with the fastest and most extensive communications networks by 2023;
- h) By 2024, every Gambian should have affordable access to robust broadband service and the means and skills to subscribe thereto if they so choose;
- i) By 2024, every public institution should have affordable access to at least not less than 5Mbps broadband service to anchor institutions such as schools, hospitals and government buildings and an increase in digital literacy in schools to 75%;
- j) Expanding broadband to all local government areas and districts and to have 75% digital literacy amongst the Government workforce and 65% the total national workforce by 2024;
- k) Ensuring safety of the public at large, every alarm monitoring and security response service provider should, by 2024, have access to a nationwide, wireless, interoperable broadband public safety network.

Each of these targets requires a careful planning for human capital development.



## **9. VISION AND MISSION**

The vision and the mission carved out for this HCD Plan is equally informed by the overall vision of the ICT4D Policy and the NDP. As the key target is the workforce the statement on vision is to cover (capacity) and the capability with emphasis on excellence, leadership and innovation. As to what should truly drive the strategy, the focus is on the framework and its peculiarities for the purposes and benefits of The Gambia.

### **8.1 Vision**

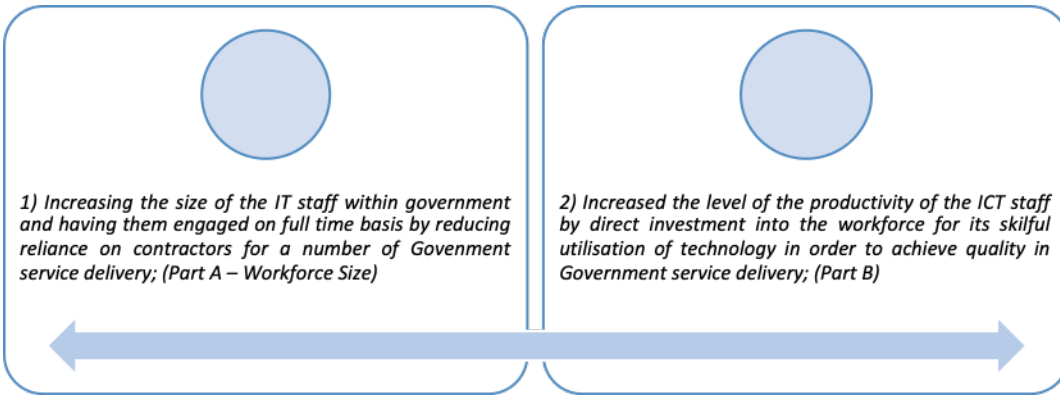
A model of excellence, competitiveness, innovativeness and leadership in ICT human capital development that is responsive to the dictates of knowledge-based economy in a globalised information society.

### **8.2 Mission**

To lead and support The Gambia through the development of a capable, dedicated and diverse ICT human capital through ICTs.

## 10. GOALS AND OBJECTIVES

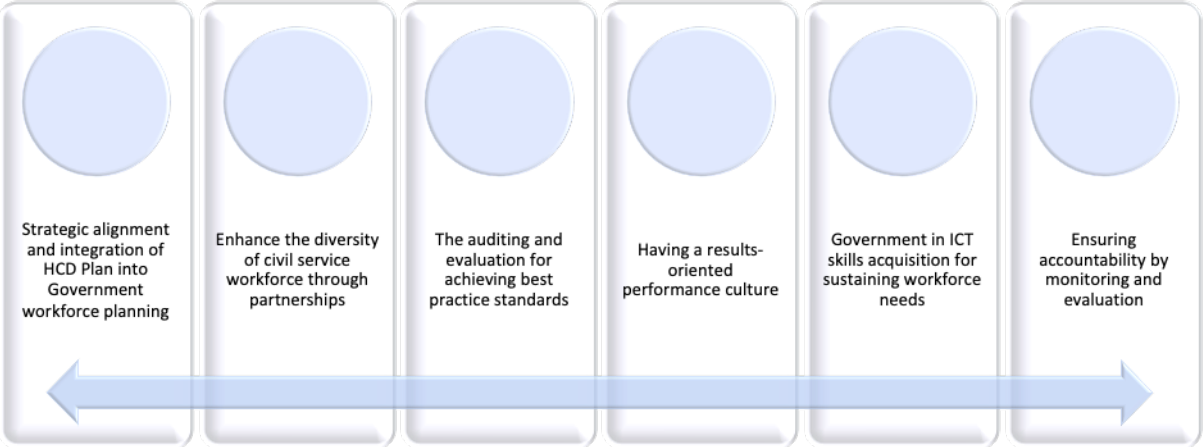
The goals and objectives outlined are designed to push for two primary goals, to wit:



### 9.1 Goals A- Increasing Workforce Size (Objectives)



9.2 Goals B – Ensuring Workforce Productivity (Objectives)



### 9.3Part A – Relating Activities Within the Objectives for Increasing Workforce Size

9.3.1 Creating a Critical Mass of ICT Professionals & Knowledgeable Workforce	
SCOPE	ACTIVITIES
Confidence building and reliance on Local Resources	a) <i>Having an agreement on the direct provision of education, training in new skills, bringing in new information and other technologies within the framework of an FDI;</i>
	b) <i>Encouraging reverse engineering by breaking up a product, or analyzing a piece of software, and rebuilding it with an existing know-how and resources;</i>
	c) <i>Encouraging The Gambians in the diaspora to maintain relationships with the Government and serve as a source of ICT specialists, entrepreneurs and that could be tapped for ICT development in The Gambia;</i>
	d) <i>Enhancing the institutional infrastructure to support and facilitate technology transfer, and may also provide training activities outside formal education through R&amp;D institutions<sup>[17]</sup> that can provide scientific;<sup>[SEP]</sup></i>
Government Focus Activities	<p>e) <i>To enable a more productive use of the Government’s human resources by:</i></p> <ul style="list-style-type: none"> <li>i. Improving the ability of a special category of the civil servants with common purpose to understand technical processes, acquire the knowledge about them, interpret and adapt them to suit the country’s local conditions and apply it creatively to the solution of practical problems;</li> <li>ii. Ensuring that the ministries, departments and agencies including LGAs and NGOs enable the integration of technical knowledge possessed into a coherent framework and apply the same in a complementary and productive manner;</li> <li>iii. Consideration of out-sourcing on capacity building on the basis of technology cooperation with recognize firms;</li> <li>iv. Having marketing and service alliances on procurement, sale and or servicing of ICT Applications;</li> <li>v. Entering into licensing agreements, technology and personnel exchange, joint development, research partnerships;</li> <li>vi. Entering into testing agreements and standards coordination and joint ventures;<sup>[17]</sup> <sup>[SEP]</sup></li> </ul>

**9.3.2 Develop Leaders and Talented Employees at all Levels**

<b>SCOPE</b>	<b>ACTIVITIES</b>
<p>Framework for Engagement, Training and Retention</p>	<p>a) <i>Develop a process to continually strive to increase the satisfaction and engagement of Government employees;</i></p>
	<p>b) <i>Establish appreciation, rewards and incentives framework for employees who collaborate and innovate in digital activities;</i></p>
	<p>c) <i>Encourage and recognize employees and for their collaborative, innovative, and creative ideas and projects;</i></p>
	<p>d) <i>Encourage the building of specific skills and capabilities through active coaching and support;</i></p>
	<p>e) <i>Identify and develop a new cadre of leaders that are capable of enhancing the efficiency of civil service;</i></p>
	<p>f) <i>Develop a mandatory supervisory training program for all managers and principal ICT officers on matters of ICTs and innovation, equal opportunity, safety, supervisory skills and performance management;</i></p>
	<p>g) <i>Carry out periodic survey of Government employees on ICT training needs and requirements for consideration;</i></p>

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<b>9.3.3 Talent Management Through Recruitment, Outreach, Hiring and Retention</b>	
<b>SCOPE</b>	<b>ACTIVITIES</b>
<i>Creating Certitude in the Built Human Capital</i>	<i>a) Automating manual and paper-based processes for hiring;</i>
	<i>b) Recruit and retain a diverse, highly skilled, and technologically competent workforce;</i>
	<i>c) Ensuring a more accurate projections about the government's future needs for ICTs in administration and governance;</i>
	<i>d) To put in place a talent management system that addresses competency gaps through programs for attracting, acquiring, developing, promoting, and retaining quality talent;</i>
	<i>e) A proper pay policy planning for the necessary ICT human capacity that has to have a special treatment and status;</i>
	<i>f) Facilitating Training of trainers and in-house training and developing customized training courses according to identified needs;</i>
	<i>g) Pursuing ITU e-learning activities that is free-of-charge for public administrations and communicating about new courses and promoting internships;</i>
<i>Enhancing Talent</i>	<p><i>Talent Management Strategies including:</i></p> <ul style="list-style-type: none"> <li><i>i. Revise and deploy an integrated workforce plan through ICT for enabling the Government through PMO to hire and retain the right talent, at the right time, in the right place;</i></li> <li><i>ii. Review and enhance through ICT applications an orientation process that includes ICT in governance and develop and implement a plan to streamline and improve employee orientation and on-boarding;</i></li> <li><i>iii. Putting in place automation strategy, specifically including evaluation for an automated staffing system to address human resources capability needs;</i></li> <li><i>iv. Reassess and reevaluate competency models for Information Technology (IT), in addition to Human Resources (HR) and Financial Management (FM) occupations and accordingly develop, implement, and measure workforce development strategies;</i></li> <li><i>v. Review the classification and qualification standards in relation to the changes dictated by technology for critical roles and functions;</i></li> <li><i>vi. Putting in place an exit survey tool to identify cases and reasons for attrition of ICT staff;</i></li> </ul>

<b>9.3.4 Supports a Culture of Leadership and Continuous Learning Through ICTs</b>	
<b>SCOPE</b>	<b>ACTIVITIES</b>
<i>ICT Competencies and Strong Leadership</i>	<i>To identify tools and processes that will enable the identification and definition of the ICT competencies that Government must develop and retain to ensure that right skills are available in meeting the ICT organizational goals;</i>
	<i>The conduct of an annual ICT training needs assessment to ensure training is designed to improve Government and employee performance;</i>
	<i>Developing a leadership succession plan including a leadership gap analysis in relation to ICTs;</i>
	<i>To evaluate the current training and development programs of the government to determine how well they meets short and long range ICT needs, and develop an action plan to address any needs;</i>
	<i>To cater for the implementation of at least one knowledge management tool to support knowledge sharing across Government;</i>
	<i>Establishing an ICT leadership curriculum for all senior Government officers to invest in the continuous development of leadership;</i>
	<i>To institute internal and external learning opportunities for all employees, using a variety of learning tools that provide opportunity for continuous learning.</i>

## 9.4 Part B – Relating Activities Within the Objectives for Workforce Productivity

9.4.1 Strategic Alignment and Integrating HCD Plan into Workforce Planning	
SCOPE	ACTIVITIES
Human Capital Framework	a) Expanding the ICT human capital efforts into a comprehensive program that includes human capital planning, collaboration and accountability for human capital operations;
	b) Putting in place a workforce planning system that identifies the IT human capital requirements including the needed needed skills, staffing requirements, tracking of human capital metrics and measurements and strategies for retention and development;
	c) Developing an integrated ICT workforce analysis capability that enables data- driven strategic and operational human capital management decision-making;
	d) Develop risk management models for areas of ICT human capital concerns and issues; <sup>[1]</sup> <sub>SEP</sub>
	e) Having a framework for the continuous monitoring of the demographic data of the ICT workforce, such as, age, race, locations of <sup>[1]</sup> <sub>SEP</sub> employees, professions, retention rates, etc.
Standard Service Regulations	a) Create related high-level framework guidelines, tools and training materials based on international best practices;
	b) Support the ICT employees with efficient and effective human resources policies and practices to ensure retention and productivity;
Consultative Engagement	a) Partnering with ITU-D on human capacity development through continuous training and skills development, sharing of best practices and success stories, establishment of a networking platform, through awareness of the importance of ICTs at government level, benchmarking and study group;
	b) Provide clear and steadfast human capital information at all levels of Government based on priorities, cost effectiveness, and demonstrated value; <sup>[1]</sup> <sub>SEP</sub>



<b>9.4.2 Enhance the Diversity of Civil Service Workforce Through Partnerships</b>	
<b>SCOPE</b>	<b>ACTIVITIES</b>
<i>Performance Management</i>	a) <i>Having a framework for for equal opportunity in the recruitment and specialised training of employees within the ICT domain for unique government services;</i>
	b) <i>Having an annual track and report system within the performance management framework that promotes accountability for achieving diversity and equal employment opportunity; <sup>[17]</sup> <sub>[SEP]</sub></i>
	c) <i>Carry out periodic internal consultation on diversity hiring opportunities; <sup>[17]</sup> <sub>[SEP]</sub></i>
<i>Standard Service Regulations</i>	a) <i>Encourage and track the recruitment of people with disabilities into all levels and professions of Government to ensure diversity;</i>
	b) <i>Enhancing the civil service rules for the prevention of harassment at workplaces;</i>

**9.4.3 The Auditing and Evaluation for Achieving Best Practice Standards**

<b>SCOPE</b>	<b>ACTIVITIES</b>
Standards ensuring optimal Output	a) To create the competence for evaluating human capital processes, <sup>[I]</sup> <sub>SEP</sub> services, and activities. <sup>[I]</sup> <sub>SEP</sub>
	b) To have Human Capital Accountability System that is to assess and evaluate human capital processes, <sup>[I]</sup> <sub>SEP</sub> services, and activities; <sup>[I]</sup> <sub>SEP</sub>
	c) On an annual basis, to develop and submit ICT human capital management report <sup>[I]</sup> <sub>SEP</sub> to the PMO that catalogues the annual human capital goals and strategies, key performance indicators (KPI), human capital impact, and recommendations for continued process improvement;
	d) Have a survey, analyze, and communicate results of human capital processes and services, such as training needs assessment, performance management, employee orientation, customer service, etc.;

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<b>9.4.4 Having a Results-Oriented Performance Culture</b>	
<b>SCOPE</b>	<b>ACTIVITIES</b>
Capacity and Capability enhancement	a) Targeting special experts through outreach programs and internal advancement strategies for enhancing the measures put in place for human capital development;
	b) Review the current performance management system and awards program by using related performance appraisal assessment tool based on a survey data;
	c) Develop and implement a fully resourced framework for full integration of an Electronic Performance Management System (EPMS) for all employees that includes technology, program manager, and training plans, so that the Government Performance Management System is streamlined, time and results-driven, and employee-focused; <sup>[1][7]</sup> <sub>[SEP]</sub>
	d) Keeping the Government senior management informed of the annual results of the Performance Management System; <sup>[1][7]</sup> <sub>[SEP]</sub>
Addressing and Managing Performance Gaps	*** Improving the performance by closing the current performance gap; <sup>[1][7]</sup> <sub>[SEP]</sub>
	i. Identifying and addressing the shortage of strategic skills/competencies facing the ICT sector more specifically the knowledge of the strategic human resources management for ICTs;
	ii. Facilitating the adoption of ICT applications and technology trends for e-Government services;
	iii. Having a workable policy and regulation in a converged environment;
	iv. Promoting ICT project management in Government and ICT skills in business process management (BPM) and employees utilization of NGN;
	v. The ICT Agency to facilitate the development and implementation of a long-term and consistent Government ICT skills agenda in close cooperation between the public and private sectors; <sup>[1][7]</sup> <sub>[SEP]</sub>
	vi. Creating access to the ITU-D Human Capacity Building website; <sup>[1][7]</sup> <sub>[SEP]</sub>
	vii. The establishment of local networks of human resources managers, especially among Ministries, departments, agencies, LGAs and NGOs;
	viii. The establishment of local networks of technical, strategic and financial managers and professionals, especially of Ministries, departments, agencies, LGAs and NGOs;
	ix. Partnership with donor organizations for providing access to the e-libraries, constituting a bridge to citizens and experts; <sup>[1][7]</sup> <sub>[SEP]</sub>

<b>9.4.5 Government in ICT Skills Acquisition for sustaining workforce needs</b>	
<b>SCOPE</b>	<b>ACTIVITIES</b>
<i>Training and Capacity Building</i>	a) <i>Identifying the ICT capacity and capabilities required to effectively deliver government and national priorities;</i>
	b) <i>Encouraging massive local and global ICT skills acquisition through training in the public and private sectors with a view to achieving a strategic medium-term milestone of at least 50,000 (2%) ICT skilled personnel by the year 2024.</i>
	c) <i>Creating a pool of highly trained professionals that drive the next generation of ICT development through research and development efforts in the private and public sectors.</i>
	d) <i>Facilitating special ICT courses through formal education on Government and ICTs at all levels (provided by educational institutions at different levels: kindergarten, primary education, secondary education, vocational training, tertiary education, adult education, distance learning, etc.);</i>
	e) <i>Facilitating special ICT courses through non-formal education on Government and ICTs at all levels (provided by enterprises and public organizations through training and R&amp;D activities);</i>
	f) <i>Encouraging learning in informal environments (taking place within families, in communities, through media and information networks, societal learning, learning by doing, learning by observing others);</i>
<i>Productive Ventures</i>	a) <i>To ensure that ICT resources are available to promote efficient national development.</i>
	b) <i>To guarantee that the country benefits maximally and contributes meaningfully by providing global solutions to the challenges of the information age.</i>
	c) <i>To encourage local production and manufacture of ICT components in a competitive manner.</i>
	d) <i>To empower government and public servants to participate in IT and software development and local content creation at national and local Government levels by;</i> <ul style="list-style-type: none"> <li>i. <i>Targeting any investment capacity available at strategically chosen market niches as the software industry requires relatively much less capital expenditure on equipment and, instead, shifts the emphasis predominantly towards human capital.</i></li> <li>ii. <i>Increase the reliance of commercial and industrial enterprises in The Gambia on the Internet as ubiquitous communication medium to globalize their operational activities in creating a market for software development.</i></li> <li>iii. <i>Making the production of software cheaper for acquisition by the global market;</i></li> </ul>

**9.4.6 Ensuring Accountability by Monitoring and Evaluation**

<b>SCOPE</b>	<b>ACTIVITIES</b>
Quality with Accountability	Tracking and improving Government service delivery; Develop, implement, and evaluate government's human capital accountability system;
Planning	Having a human capital analytical tool like human resource dashboard that highlights key employee and organizational demographics, metrics and performance indicators;

## **11. IMPLEMENTATION AND GOVERNANCE**

This HCD Plans pertains to ICTs in human capital development for Government service delivery. The implementation of each strategic intervention requires a plan that includes the actions and activities related to each strategic objective. The responsibilities and roles of stakeholders are captured in the tables that follow including a time-scale as well the monitoring and evaluation for its implementation framework.

The implementation plan is a guide in the further development of annual action plans. It is flexible in order to respond to any future Government changes. To effectively implement the strategy, it is also considered important to define the management and governance structures, the funding mechanisms and indicative budget and the specific activities. The management and governance structures are important to ensure that decision-making processes are transparent and that the strategy is effectively implemented. As the main responsibility for implementation is with MOICI but some specific activities are spread across different Ministries and agencies and so cooperation with MOICI and the ICT Agency, as the mandated coordinating agency, will be required.

The defined activities that helps in reflecting the indicators are to provide the means of monitoring and evaluating the progress of the Implementation Plan. The data required for each of these indicators are relatively easy to collect. The main outcome is to determine the required number and efficiency in the application and use of ICTs by Government staff in its service delivery.

### **10.1 Coordination**

As the issue of having an effective adoption and application of ICTs within the Governance set up is multidimensional in scope, the issue of coordination is key. MOICI will be in the forefront together with the ICT Agency and the PMO (especially on training and assessment) on this critical issue of coordination. Even in the development of the annual action plans and government budgeting the consultation shall be across the entire Government machinery.

MOICI may have to plan for a special memorandum of understanding with a number of other state agencies in their adoption of the measures. This is even important especially where a number of the Government agencies or institutions may need special instruments (where their legislations are not covering) to embark on the implementation.

There shall be a Special Committee on this HCD Plan to lead by MOICI with membership from PMO, PSC, University of The Gambia (UTG), Ministry of

Higher Education, Research, Science and Technology and some Government agencies to be determined by MOICI.

## 10.2 Annual Report

MOICI shall ensure that a report on the implementation of this HCD Plan is made available to all Government ministries, agencies and other important stakeholders annually.

## 10.3 Workforce Plan

All Ministries and Government agencies are required to submit their ICT workforce plans to both the PMO and MOICI for a joint review in consideration of this HCD Plan. The results of these reviews will inform and add value to future Government ICT workforce planning and related strategies and activities.

This workforce plan provides a framework to support a consistent approach to implementing the HCD Plan. It also provides scope for tailoring by individual agencies. With the help of online ICT applications, mechanisms would be put in place to enable continuous feedback.

The development of the ICT workforce plans of the ministries and agencies as well as their review must be consultative done annually as per the table below.

<b>NO</b>	<b>Contents of the Agency-Level Workforce Plan</b>
i.	An analysis of the agency's current and future operating environment in relation to ICTs and human capital.
ii.	An analysis of the external environment.
iii.	An analysis of the agency's ICT workforce capacity and capability.
iv.	Learning and development options.
v.	Future capability requirements including the use distinguished management applications for the assessment of organisational capabilities;.
vi.	Recruitment and retention strategies.
vii.	Targeted intakes for entry-level staff.

The PMO and MOICI can provide advice and guidance to agencies as required in the development of their agency-level ICT human capital plans, and also to review the said plans with annual reports.

## 12. RISKS MITIGATION STRATEGIES

In the course of the consultation a few significant strengths, weaknesses, opportunities and threats associated with the country's ICT Sector are identified. Accordingly, they provide an understanding on some potential risks for which mitigating strategies are formulated. To manage the risks, an outlined risk mitigation strategy is considered, and this is placed in an annex for the purposes of this Plan.

The most important component in the identification of the risks is to have the undivided commitment and strong political will and support from the Government by making sure that ICT is recognized as "super infrastructure" and key pillar of development. Secondly, there would be the need for the identified prerequisites to have been addressed at beginning of the implementation of this HCD Plan.

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Further, the awareness levels amongst all key stakeholders of the need for the use of ICTs in human capital development is rather limited. There must be advocacy and promotion of the strategy as well as the conduct of national awareness campaign. Moreover, having an advocacy plan with messages for the different stakeholder groups would go a long way in ensuring commitment to the objectives of the strategy.

The strategy's success is also based on the active support of the Government more so MOICI, PMO, MOHERST and University of The Gambia. The works of a number of international agencies and cooperation and collaboration groupings cannot be side-lined. All these will add value to the mitigation of the risks.



## **13. FUNDING**

A critical success factor for the implementation of this HCD Plan is the level of funding it receives. Accordingly, the following activities are considered for the funding of this Strategic Plan:

With the e-Government plans of the Government, the cost of governance is expected to reduce, and the efficiency improved. This ICT human capital development is part of the process of e-Government with possibilities for the governance cost to come down. Therefore, the first recognized source of funding is Government allocation. The workforce would be expected to use and rely on ICT application in the government service delivery. As governance is a business of everyone, private sector will also be encouraged to continue complementing government efforts in Government service delivery in form of investing in e-Government network that the workforce would be running.

### **12.1 Government Fund**

Government has the absolute role in governance, so it has to fund the HCD Plan in Government Budget allocation. After all, the ICT sector contributes more to the GDP base on the statistics.

### **12.2 Local Government Entities**

There would always be a need for the LGAs to have a special link to the e-Government platform. As there would be a workforce to run this network, the utilisation of the network by the LGAs could be at a certain cost however small. A part of this could also be used to facilitate the implementation of this HCD Plan.

### **12.3 Donor Funding**

Donor fund could be sought for the setting up of the e-Government network for the facilitation of this unique workforce. A number of donor agencies will continue to show interest in initiatives through governance cost is to be reduced in applying and adopting ICT and its related workforce.

### **12.4 Citizens utilisation of e-Government service**

A number of e-Government services are not to be completely free. The government may continue to receive some special payments for some of the online services. A commitment could be made to target a certain percentage of

the monies received from such services to be allocated to the implementation of this HCD Plan.

### 12.5 Training Levy

There is the training levy on all companies as a means of fulfilling their social responsibility. The funds generated from such levies are used to support technical and vocational training. The scope of this levy and the fund's usage could be expanded. A number of trainings in the creation of this workforce could benefit from this fund.

## 14. MONITORING AND EVALUATION

Once the implementation becomes effective in 2021, the monitoring of the strategy, through the review of the implementation plan, would be undertaken on an annual basis by MOICI, the PMO and the ICT Agency in consultation with the other ministries and Government agencies. The review is to assess progress and to ensure that the strategic actions remain appropriate and are aligned with the overall human capital goals. The annual report shall contain an aspect on accountability management for the defined objectives.

The review of the Policy can be undertaken even before the end of a given year in consultation with the relevant stakeholders on the basis of any of the following:

- a) Any changes in the National Development Plan are made to ensure that human capital development efforts are compatible with national priorities;  
[L]  
[SEP]
- b) A significant structural change in the labour market and or the ICTs in their application to governance that require immediate policy review;  
[L]  
[SEP]
- c) A response is made to any changes in the country's demographics, particularly around practices that influence the hiring and employment;
- d) Highly visible improvements in the management of the Government ICT workforce and the impacts require some changes to this HCD Plan for sustainability;
- e) Significant changes with impact on governance that are never anticipated;

The workforce planning process is to serve as a roadmap for senior managers to ensure that the right talent is in place to achieve both short and long-term goals. On a four-year cycle, there will be the conduct a more comprehensive review of the HCD Plan by requesting input from all stakeholders.

## 15. ANNEXES – IMPLEMENTATION DETAILS AND COSTS

<b>14.1 Creating a Critical Mass of ICT Professionals &amp; Knowledgeable Workforce</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>ICTs strongly impact on every industry and commercial or other human activity, requiring all professionals to be competent in ICT skills as a user, or a creator, to an extent that is second only to their first specialty, whether one is a scientist, a banker, a medic or a librarian. To ensure effective and optimum utilization of ICTs in such activities it is necessary to have a pool of professionals in such areas with the necessary ICT skills and competence.</i>
3	<i>Description of Planned Action</i>	<i>To develop a critical mass of qualified ICT professionals who are capable of supporting effective use of ICT across the spectrum of economic and social activities through the Government.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>They are to support the effective adoption and use of ICT across the spectrum of economic and social activities.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Creating a critical mass of ICT professionals and knowledgeable workforce;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<ul style="list-style-type: none"> <li><i>a) Proper management and coordination for policy's implementation through an entity like the ICT Agency with enhanced human resources and relevant legislative and regulatory changes.</i></li> <li><i>b) A clear framework for coordination, cooperation and collaboration.</i></li> <li><i>c) Diversified sources of funding for its implementation;</i></li> </ul>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q3 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>Recognized pool of ICT professionals</i>
9	<i>Time Bound Measurable Targets</i>	<ul style="list-style-type: none"> <li><i>a) Having an agreement on the direct provision of education, training in new skills, bringing in new information and other technologies within the framework of an FDI;</i></li> <li><i>b) Identified Gambians in the diaspora having an established relationship with the Government and serving as source of ICT</i></li> </ul>

		<i>specialists, entrepreneurs and that could be tapped for ICT development in The Gambia;</i>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Productive application and use of the Government's human</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<p>a) <i>The commitment and support from all stakeholders;</i></p> <p>b) <i>The pool having the means and incentives to pool their expertise as and when necessary, and that in they in turn are supported by professional organizations and appropriate scientific establishments (universities, research institutions, etc;</i></p>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda;</i>
16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<p>a) <i>A special framework for encouraging reverse engineering by breaking up a product, or analyzing a piece of software, and rebuilding it with an existing know-how and resources;</i></p> <p>b) <i>A framework of technology transfer;</i></p>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

ISEP

<b>14.2 Develop Leaders and Talented Employees at all Levels</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	Planned Action Type	Policy
2	Background to Planned action	This is a need to encourage a culture of cross-functional leadership development that routinely identifies creative and innovative strategies to problem solving within the service delivery line and the sharing of lessons across the units of Government. This, in effect, is to help creative people be creative through engagement, collaboration and innovation.
3	Description of Planned Action	To identify and develop leaders within the government /agency employees and put up measures to retain them for efficient Government service delivery.
4	Planned Action Implementation Rationale	Having a work environment that is relevant and innovative and one that benefits from a collaborative, <sup>ICT</sup> diverse and dynamic workforce in order to achieve operational success.
5	Planned Action Specific Goals/Objective	Develop leaders and talented employees at all levels to help achieve operational success;
6	Planned Action Implementation Prerequisites	A clear framework for coordination, cooperation and collaboration.
7	Planned Action Time Frame	To begin by Q3 of 2021
8	Planned Action Deliverables	Clear and efficient leadership
9	Time Bound Measurable Targets	a) Established appreciation, rewards and incentives framework for employees who collaborate and innovate in digital activities; b) A recognition system for employees and for their collaborative, innovative, and creative ideas and projects; c) Identified cadre of leaders that are capable of enhancing the efficiency of civil service;
10	Implementing Agency	MOICI, PMO, ICT Agency, MOHERST
11	Planned Action Outputs	An efficient Government service delivery backed by resourced ICT workforce
12	Anticipated Beneficiaries	All stakeholders
13	Resource Mobilisation and Costing	See Below
14	Planned Action Critical Success Factors	a) The commitment and support from all stakeholders;  b) Sufficient trust on the part of the stakeholders for implementation;
15	Planned Action	The availability of sufficient and qualified ICT

	<i>Implementation Risks</i>	<i>professionals and experts</i>
16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>d) A Developed process for increasing the satisfaction and engagement of Government employees;</li> <li>e) Developed mandatory supervisory training program for all managers and principal ICT officers on matters of ICTs and innovation, equal opportunity, safety, supervisory skills and performance management;</li> <li>f) Survey reports on Government employees on ICT training needs and requirements for consideration;</li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	MOICI, PMO, ICT Agency, MOHERST, MOFAGA

<b>14.3 Talent Management Through Recruitment, Outreach, Hiring and Retention</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>As the civil servants through the PMO drive the the success of the governance process, a special focus on talent management will enable the Government to become more strategic and deliberate in attracting and retaining employees.</i>
3	<i>Description of Planned Action</i>	<i>There will be a workforce planning as it provides understanding of the respective Government positions and skill sets, the proactive staff planning can help improve the recruitment and application experience, within the overall hiring process.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>To have better understanding of employees' needs and of measures to retain skilled and productive employees.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Talent management by maximizing employee talent through recruitment, outreach, hiring and retention;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<p>a) <i>Proper management and coordination for policy's implementation through an entity like the ICT Agency with enhanced human resources and relevant legislative and regulatory changes.</i></p> <p>b) <i>A clear framework for coordination, cooperation and collaboration.</i></p>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q4 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>A wholly qualified and efficient workforce</i>
9	<i>Time Bound Measurable Targets</i>	<p>a) <i>An Automated manual and paper-based processe for hiring;</i></p> <p>b) <i>A talent management system that addresses competency gaps through programs for attracting, acquiring, developing, promoting, and retaining quality talent;</i></p> <p>c) <i>A proper pay policy planning for the necessary ICT human capacity that has to have a special treatment and status;</i></p> <p>d) <i>A framework for facilitating Training of trainers and in-house training and developing customized training courses according to identified needs;</i></p>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Having an effective and efficient application of ICTs in Government workforce management.</i>



12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<p>c) <i>The commitment and support from all stakeholders;</i></p> <p>d) <i>A revised an integrated workforce plan through ICT for enabling the Government to hire and retain the right talent, at the right time, in the right place;</i></p> <p>e) <i>An orientation process that includes ICT in governance and develop and implement a plan to streamline and improve employee orientation and on-boarding;</i></p> <p>f) <i>An automation strategy, specifically including evaluation for an automated staffing system to address human resources capability needs;</i></p> <p>g) <i>A competency model for Information Technology (IT), in addition to Human Resources (HR) and Financial Management (FM) occupations and accordingly develop, implement, and measure workforce development strategies;</i></p> <p>h) <i>A clear classification and qualification standards in relation to the changes dictated by technology for critical roles and functions;</i></p> <p>i) <i>An exit survey tool to identify cases and reasons for attrition of ICT staff;</i></p>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda and the failure in coordination is securing the talent;</i>
16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<p>a) <i>Availability of highly skilled, and technologically competent workforce;</i></p> <p>b) <i>Accurate projections about the government's future needs for ICTs in administration and governance;</i></p> <p>c) <i>Established link with the ITU e-learning activities that is free-of-charge for public administrations and communicating about new courses and promoting internships;</i></p>

17	<i>Planned Implementation and Responsibility</i>	<i>Action monitoring Evaluation</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
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<b>14.4 Supports a Culture of Leadership and Continuous Learning Through ICTs</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>Transitioning into the knowledge-based economy and to get the very best out of the adoption and utilisation of ICTs, the Government would have to depend on leaders (across the board) who possess the knowledge, skills, and abilities to effectively lead the workforce in support of the policies.</i>
3	<i>Description of Planned Action</i>	<i>The commitment to developing leadership capacity and to ensuring continuity in leadership even as employees retire or move to new responsibilities will greatly depend on continuous training and development.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>To ensure an efficient leadership and knowledge management system for continuity of leadership in Government service delivery by identifying and addressing potential gaps in effective leadership and implements and maintains programs that capture organizational knowledge and promote learning.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Supports a culture of leadership and continuous learning through ICTs;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<ul style="list-style-type: none"> <li><i>a) Effective stakeholder coordination and Government commitment for policy's implementation.</i></li> <li><i>b) A clear framework for coordination, cooperation and collaboration.</i></li> <li><i>c) Adequate and Diversified sources of funding for its implementation;</i></li> </ul>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q3 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>A determined culture of leadership that promotes learning.</i>

9	<i>Time Bound Measurable Targets</i>	<p>a) A conducted ICT training needs assessment to ensure training is designed to improve Government and employee performance by the end of the first year of implementation;</p> <p>b) Having a leadership succession plan including a leadership gap analysis in relation to ICTs;</p> <p>c) An established ICT leadership curriculum for all senior Government officers to invest in the continuous development of leadership;</p>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Established ICT Competencies and Strong Leadership</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<p>a) The commitment and support from all stakeholders;</p> <p>b) Adequate awareness campaign and communication in relation to the identified programmes in this Plan;</p> <p>c) Sufficient trust on the part of the stakeholders for implementation;</p>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda;</i>

16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>a) <i>Having identified tools and processes that will enable the identification and definition of the ICT competencies that Government must develop and retain to ensure that right skills are available in meeting the ICT organizational goals;</i></li> <li>b) <i>The evaluation of the current training and development programs of the government to determine how well they meets short and long range ICT needs, and develop an action plan to address any needs;</i></li> <li>c) <i>To cater for the implementation of at least one knowledge management tool to support knowledge sharing across Government;</i></li> <li>d) <i>Instituting internal and external learning opportunities for all employees, using a variety of learning tools that provide opportunity for continuous learning.</i></li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.5 Strategic Alignment and Integrating HCD Plan into Workforce Planning</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>Strategic human capital management is a critical component of strategic planning and the alignment ensures that the most critical resource (employees) are linked with the overall national policy goals for ICT in human capital development. It will help ensure that the defined goals and strategies within this HCD Plan support the overall national policies (ICT4D and NDP)</i>
3	<i>Description of Planned Action</i>	<i>Identifying measures for alignment and integration in relation to the HCD Plan.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>Having a planned and accountable capacity for workforce analysis capability that will make more meaningful information and tools available to manage the workforce.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Strategic alignment and integration of HCD Plan into Government workforce planning;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<i>The adoption of this HCD Plan and the identified alignment and integration needs.</i>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q2 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>A clear and adopted human capital framework</i>
9	<i>Time Bound Measurable Targets</i>	<p>a) <i>A workforce planning system that identifies the IT human capital requirements including the needed needed skills, staffing requirements, tracking of human capital metrics and measurements and strategies for retention and development;</i></p> <p>b) <i>Rrisk management models for areas of ICT human capital concerns and issues; <sup>[1]</sup> <sub>[SEP]</sub></i></p> <p>c) <i>An executed Partnership with ITU-D on human capacity development through continuous training and skills development, sharing of best practices and success stories, establishment of a networking platform, through awareness of the importance of ICTs at government level, benchmarking and study group;</i></p>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>A good ground for consultative engagement with standard service regulations</i>

12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<i>The commitment and support from all stakeholders;</i>
15	<i>Planned Action Implementation Risks</i>	<i>Failure to identify the alignment and integration needs and the absence of enough time or funds for the implementation of a strategic agenda;</i>
16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>a) <i>Expanded the ICT human capital with comprehensive program that includes human capital planning, collaboration and accountability for human capital operations;</i></li> <li>b) <i>Developing an integrated ICT workforce analysis capability that enables data- driven strategic and operational human capital management decision-making;</i></li> <li>c) <i>Having a framework for the continuous monitoring of the demographic data of the ICT workforce, such as, age, race, locations of <sup>ICT</sup> employees, professions, retention rates, etc.</i></li> <li>d) <i>Related high-level framework guidelines, tools and training materials based on international best practices;</i></li> <li>e) <i>A support the ICT employees with efficient and effective human resources policies and practices to ensure retention and productivity;</i></li> <li>f) <i>Provide clear and steadfast human capital information at all levels of Government based on priorities, cost effectiveness, and demonstrated value;</i></li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.6 Enhance the Diversity of Civil Service Workforce Through Partnerships</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>There will be the need to foster an organizational environment that encourages an inclusive workforce representative of the the country's diversity.</i>
3	<i>Description of Planned Action</i>	<i>Applying measures to attract, maintain and optimize a productive, motivated, and creative workforce that is more representative of the country's diversity with competencies needed to deliver sustained levels of excellence.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>To ensure culture of equal opportunity as well as personal, professional, and organizational accountability. <sup>[17]</sup> <sub>[SEP]</sub></i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Enhance the diversity of civil service workforce through partnerships;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<i>Government to address the prerequisites outlined in this Plan (above)</i>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q4 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>Standardised service regulations</i>
9	<i>Time Bound Measurable Targets</i>	<p>a) <i>An annual track and report system for promoting accountability for achieving diversity and equal employment opportunity; <sup>[17]</sup> <sub>[SEP]</sub></i></p> <p>b) <i>Enhanced civil service rules for the prevention of harassment at workplaces;</i></p>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Credible performance management regime</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<i>A clear commitment of the government and readiness to enter into partnerships.</i>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda;</i>



16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>a) <i>A framework for equal opportunity in the recruitment and specialised training of employees within the ICT domain for unique government services;</i></li> <li>b) <i>Framework on periodic internal consultation on diversity hiring opportunities; <sup>[1]</sup><sub>SEP</sub></i></li> <li>c) <i>The recruitment of people with disabilities into all levels and professions of Government to ensure diversity;</i></li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.7 The Auditing and Evaluation for Achieving Best Practice Standards</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>There is a need to promote a working environment and a culture that is adaptive, accountable and entrepreneurial. <sup>[1]</sup><sub>[SEP]</sub></i>
3	<i>Description of Planned Action</i>	<i>To carry out audit and evaluation based on international best practices.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>To create the competence for evaluating human capital processes, <sup>[1]</sup><sub>[SEP]</sub>services, and activities. <sup>[1]</sup><sub>[SEP]</sub></i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>The auditing and evaluation for achieving best practice standards;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<ul style="list-style-type: none"> <li>a) <i>The right capacity and timing for the conduct of the audit</i></li> <li>b) <i>A clear framework for the conduct of the audit</i></li> </ul>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q1 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>A sustainable HCD Plan with value and direction.</i>
9	<i>Time Bound Measurable Targets</i>	<i>A Human Capital Accountability System that is to assess and evaluate human capital processes, <sup>[1]</sup><sub>[SEP]</sub>Services, and activities; <sup>[1]</sup><sub>[SEP]</sub></i>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Standards for ensuring optimal output</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<ul style="list-style-type: none"> <li>a) <i>The commitment and support from all stakeholders;</i></li> <li>b) <i>Adequate awareness campaign and communication in relation to the identified programmes in this Plan;</i></li> <li>c) <i>Sufficient trust on the part of the stakeholders for implementation;</i></li> <li>d) <i>Changes in Government Organizational Structure in Response to the ICT Market and Technology Shifts;</i></li> </ul>
15	<i>Planned Action Implementation Risks</i>	<i>Evaluation based on wrong parameters and or data.</i>

16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>a) <i>Having the competence for evaluating human capital processes, <sup>[[1]]</sup>services, and activities. <sup>[[1]]</sup></i></li> <li>b) <i>Submitting an ICT human capital management report <sup>[[1]]</sup> to the PMO that catalogues the annual human capital goals and strategies, key performance indicators (KPI), human capital impact, and recommendations for continued process improvement;</i></li> <li>c) <i>A survey of human capital processes and services, such as training needs assessment, performance management, employee orientation, customer service, etc.;</i></li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.8 Having a Results-Oriented Performance Culture</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>By ICTs' very changing nature and value, there is a need to promote a diverse, high-performing workforce by implementing and maintaining effective performance management systems and awards programs. In using ICTs for enhancing human capital development, there has to be a sustainable, productive, diverse workforce that thrives on achieving results by valuing and recognizing performance in an environment in which all employees are encouraged to contribute.</i>
3	<i>Description of Planned Action</i>	<i>To devise measures and have them implemented for the realisation of result-oriented performance culture.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>A proper performance management culture impacts on appraisal process and reward/recognition programs. There should be an effective system for effectively measuring employee work performance for having higher employee satisfaction and commitment. Effective staffing decisions on promotions and developmental planning if facilitated.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Having a results-oriented performance culture;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<i>a) The general outlined prerequisites have to be addressed; b) Proper management and coordination on the part of all stakeholders;</i>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q4 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>An effective performance management regime with flexibility in managing gaps</i>

9	<i>Time Bound Measurable Targets</i>	<ul style="list-style-type: none"> <li>a) Report on skills/competencies facing the ICT sector more specifically the knowledge of the strategic human resources management for ICTs;</li> <li>b) Approved and Adopted ICT applications for e-Government services;</li> <li>c) A policy and regulation in place for a converged licensing environment;</li> <li>d) A operationalized ICT Agency facilitating the development and implementation of the HCD Plan</li> <li>e) The establishment of local networks of human resources managers, especially among Ministries, departments, agencies, LGAs and NGOs;</li> <li>f) The establishment of local networks of technical, strategic and financial managers and professionals, especially of Ministries, departments, agencies, LGAs and NGOs;</li> </ul>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Capacity and capability enhancement</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<ul style="list-style-type: none"> <li>a) <i>The commitment and support from all stakeholders;</i></li> <li>b) <i>Sufficient trust on the part of the stakeholders for implementation;</i></li> <li>c) <i>Establishment of an effective Performance Evaluation System;</i></li> </ul>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda;</i>

16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<ul style="list-style-type: none"> <li>a) <i>The targeting special experts through outreach programs and internal advancement strategies for enhancing the measures put in place for human capital development;</i></li> <li>b) <i>Having a review the current performance management system and awards program by using related performance appraisal assessment tool based on a survey data;</i></li> <li>c) <i>Developing and implementing a fully resourced framework for full integration of an Electronic Performance Management System (EPMS) for all employees that includes technology, program manager, and training plans, so that the Government Performance Management System is streamlined, time and results-driven, and employee-focused;</i></li> <li>d) <i>Keeping the Government senior management informed of the annual results of the Performance Management System;</i></li> <li>e) <i>Promoting ICT project management in Government and ICT skills in business process management (BPM);</i></li> <li>f) <i>Having direct access and effective use of the ITU-D Human Capacity Building website;</i></li> <li>g) <i>Having partnership with donor organizations for providing access to the e-libraries, constituting a bridge to citizens and experts;</i></li> </ul>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.9 Government in ICT Skills Acquisition for Sustaining Workforce Needs</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>In partnership with the educational institutions like the university of The Gambia, efforts are to be put in place for special trainings in order to satisfy the future ICT workforce needs of the Government.</i>
3	<i>Description of Planned Action</i>	<i>To prepare the relevant government ministries and agencies to acquire ICT skills and have them being utilized for the purposes of Government service delivery.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>This is to cater for sustainability for the changing ICTs needs of the Government in terms of human resources.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Government in ICT skills acquisition for sustaining workforce needs;</i>
6	<i>Planned Action Implementation Prerequisites</i>	<ul style="list-style-type: none"> <li><i>a) The identified prerequisites to have been addressed;</i></li> <li><i>b) A proper management and coordination by Government in leading the drive.</i></li> <li><i>c) A clear framework for coordination, cooperation and collaboration.</i></li> <li><i>d) Full participation by all relevant stakeholders.</i></li> </ul>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q3 of 2022</i>
8	<i>Planned Action Deliverables</i>	
9	<i>Time Bound Measurable Targets</i>	<ul style="list-style-type: none"> <li><i>a) Identified the ICT capacity and capabilities as resources for use;</i></li> <li><i>b) A pool of highly trained professionals that are to drive the next generation of ICT development through research and development efforts in the private and public sectors;</i></li> </ul>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>An environment for innovative ventures into the ICT realm especially software applications for facilitating the process of governance.</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<ul style="list-style-type: none"> <li><i>a) The commitment and support from all stakeholders;</i></li> <li><i>b) Adequate awareness campaign and</i></li> </ul>

		<p><i>communication in relation to the identified programmes in this Plan;</i></p> <p><i>c) Sufficient trust on the part of the stakeholders for implementation;</i></p> <p><i>d) Changes in Government Organizational Structure in Response to the ICT Market and Technology Shifts;</i></p> <p><i>e) Balanced Development of Basic, Applied and Professional ICT Skills;</i></p> <p><i>f) Establishment of an effective Performance Evaluation System;</i></p> <p><i>g) A software skills nurturing policy that promotes a stronger horizontal linkage between educational institutions and companies;</i></p> <p><i>h) A software skills nurturing policy that promotes a stronger horizontal linkage between educational institutions and companies;</i></p>
15	<i>Planned Action Implementation Risks</i>	<i>The absence of enough time or funds for the implementation of a strategic agenda;</i>



16

*Planned Action Monitoring and Evaluation Indicators*

- a) *An ongoing massive local and global ICT skills acquisition through training in the public and private sectors with a view to achieving a strategic medium-term milestone of at least 50 special-skills ICT personnel by the year 2024. (35 local training and 15 overseas)*
- b) *Special ICT courses being facilitated through formal education on Government and ICTs at all levels (provided by educational institutions at different levels: kindergarten, primary education, secondary education, vocational training, tertiary education, adult education, distance learning, etc.);*
- c) *Special ICT courses being facilitated through non-formal education on Government and ICTs at all levels (provided by enterprises and public organizations through training and R&D activities);*
- d) *Encouraging learning in informal environments (taking place within families, in communities, through media and information networks, societal learning, learning by doing, learning by observing others);*
- e) *Making available unique ICT resources to promote efficient national development;*
- f) *Attempts being made in encouraging local production and manufacture of ICT components in a competitive manner.*
- g) *Government employees participating in IT and software development and local content creation at national and local Government levels by;*
  - i. *Targeting any investment capacity available at strategically chosen market niches as the software industry requires relatively much less capital*

*expenditure on equipment and, instead, shifts the emphasis predominantly towards human capital.*

*ii. Increase the reliance of commercial and industrial enterprises in The Gambia on the Internet as ubiquitous communication medium to globalize their operational activities in creating a market for software development.*

*iii. Making the production of software cheaper for acquisition by the global market;*

17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
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<b>14.10 Ensuring Accountability by Monitoring and Evaluation</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy</i>
2	<i>Background to Planned action</i>	<i>An invaluable tool for the senior management of the Government is the monitoring and evaluation of the human capital policies, practices and programs. Having measures that would ensure accountability for what is done can guide the Government on the knowing the level of the skilful utilisation of technology and investment in the ICTS for quality government services;</i>
3	<i>Description of Planned Action</i>	<i>The use of the monitoring mechanism within this HCD Plan for its successful implementation.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>Tracking and improving Government service delivery.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<i>Ensuring accountability by monitoring and evaluation</i>
6	<i>Planned Action Implementation Prerequisites</i>	<p><i>a) The acceptance of the monitoring and evaluation framework by all concerned stakeholders.</i></p> <p><i>b) This is to be followed by the addressing of the established prerequisite as outlined in the Plan.</i></p> <p><i>c) Proper funding for its implementation;</i></p>
7	<i>Planned Action Time Frame</i>	<i>To begin by Q4 of 2021</i>
8	<i>Planned Action Deliverables</i>	<i>Successful implementation of the Plan.</i>
9	<i>Time Bound Measurable Targets</i>	<p><i>a) A Tracking system for Government service delivery;</i></p> <p><i>b) A human capital analytical tool like human resource dashboard that highlights key employee and organizational demographics, metrics and performance indicators;</i></p>
10	<i>Implementing Agency</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>
11	<i>Planned Action Outputs</i>	<i>Efficient government network and workforce with enhanced and reliable human capital!</i>
12	<i>Anticipated Beneficiaries</i>	<i>All stakeholders</i>
13	<i>Resource Mobilisation and Costing</i>	<i>See Below</i>
14	<i>Planned Action Critical Success Factors</i>	<p><i>a) The commitment and support from all stakeholders;</i></p> <p><i>b) Adequate awareness campaign and communication in relation to the identified programmes in this Plan;</i></p>

		<p>c) <i>Sufficient trust on the part of the stakeholders for implementation;</i></p> <p>d) <i>Establishment of an effective framework for Workforce plans;</i></p>
15	<i>Planned Action Implementation Risks</i>	<p>a) <i>Poor coordination and or acceptance by the key stakeholders.</i></p> <p>b) <i>The lack funds for the implementation of a strategic agenda;</i></p>
16	<i>Planned Action Monitoring and Evaluation Indicators</i>	<i>Developing, implementing, and evaluating Government's human capital accountability system;</i>
17	<i>Planned Action Implementation monitoring and Evaluation Responsibility</i>	<i>MOICI, PMO, ICT Agency, MOHERST</i>

<b>14.11 Risks Management and Mitigation Strategies</b>		
<b>No</b>	<b>Parameter</b>	<b>Remark/Comment</b>
1	<i>Planned Action Type</i>	<i>Policy – mitigating risks</i>
2	<i>Background to Planned action</i>	<i>There are risks for the implementation of this strategy. To manage the risks, an outlined risk mitigation strategies are considered;</i>
3	<i>Description of Planned Action</i>	<i>Defining the activities to address the identified risks to this Plan.</i>
4	<i>Planned Action Implementation Rationale</i>	<i>To eliminate uncertainty and increase certitude in the Plan's implementation.</i>
5	<i>Planned Action Specific Goals/Objective</i>	<ul style="list-style-type: none"> <li>a) <i>Creating a critical mass of ICT professionals and knowledgeable workforce;</i></li> <li>b) <i>Develop leaders and talented employees at all levels to help achieve operational success;</i></li> <li>c) <i>Talent management by maximizing employee talent through recruitment, outreach, hiring and retention;</i></li> <li>d) <i>Supports a culture of leadership and continuous learning through ICTs;</i></li> <li>e) <i>Strategic alignment and integration of HCD Plan into Government workforce planning;</i></li> <li>f) <i>Enhance the diversity of civil service workforce through partnerships;</i></li> <li>g) <i>The auditing and evaluation for achieving best practice standards;</i></li> <li>h) <i>Having a results-oriented performance culture;</i></li> <li>i) <i>Government in ICT skills acquisition for sustaining workforce needs;</i></li> <li>j) <i>Ensuring accountability by monitoring and evaluation</i></li> </ul>
6	<i>Planned Action Implementation Prerequisites</i>	<i>d) Proper management and coordination for policy's implementation through an entity like the ICT Agency with enhanced human resources and relevant legislative and regulatory changes.</i>

		<p>e) A clear framework for coordination, cooperation and collaboration.</p> <p>f) Diversified sources of funding for its implementation;</p>
7	Planned Action Time Frame	To begin by Q2 of 2021
8	Planned Action Deliverables	Successful implementation of the Plan.
9	Time Bound Measurable Targets	<p>a) Enhanced human capital for Government service;</p> <p>b) National budget with adequate allocation for HCD Policy;</p> <p>c) Efficient Governance framework through ICT Agency</p>
10	Implementing Agency	MOICI, PSC, PMO, ICT Agency, MOHERST, University of The Gambia
11	Planned Action Outputs	An adequate and productive ICT workforce within the government service delivery framework
12	Anticipated Beneficiaries	All stakeholders
13	Resource Mobilisation and Costing	See Below
14	Planned Action Critical Success Factors	<p>j) The commitment and support from all stakeholders;</p> <p>k) Adequate awareness campaign and communication in relation to the identified programmes in this Plan;</p> <p>l) Sufficient trust on the part of the stakeholders for implementation;</p> <p>m) Changes in Government Organizational Structure in Response to the ICT Market and Technology Shifts;</p> <p>n) Balanced Development of Basic, Applied and Professional ICT Skills;</p> <p>o) Establishment of an effective Performance Evaluation System;</p> <p>p) A software skills nurturing policy that promotes a stronger horizontal linkage between educational institutions and companies;</p>

		<p>q) A software skills nurturing policy that promotes a stronger horizontal linkage between educational institutions and companies;</p>
15	Planned Action Implementation Risks	The absence of enough time or funds for the implementation of a strategic agenda;
16	Planned Action Monitoring and Evaluation Indicators	<p>Having the key risk indicators in place including;</p> <p>a) An appropriate institutional infrastructure to support ICT technological capability and protect IPR and patents;</p> <p>b) Having in place an adopted framework for human capital through education at all levels, especially in ICT and technological disciplines and training;</p> <p>c) A clear framework for the promotion of innovation and R&amp;D activities both within academia and industry;</p> <p>d) The need for national commitment bound by a 'common purpose' and inspired by a visionary leadership;</p> <p>e) Coordinated action on capability building with the full involvement of government, industry and academia;</p>
17	Planned Action Implementation monitoring and Evaluation Responsibility	MOICI, ICT Agency, MOHERST, MOFEA and UTG



## 14.12 **Estimated Costs**

A number of activities have been outlined in the area under implementation and they fall under the special categories in the table below. Each is given an associated cost based on the cost standards in the table. The cost that is assigned to each activity in the table below is used in establishing general cost.

<b>NO</b>	<b>ITEM</b>	<b>ASSIGNED COSTS -DALASI</b>
<b>a)</b>	Legislation	750,000
<b>b)</b>	Regulation	250,000
<b>c)</b>	Review process	250,000
<b>d)</b>	Standards (related)	600,000
<b>e)</b>	Guidelines	250,000
<b>f)</b>	Management Reports, Planning and evaluation (related)	400,000
<b>g)</b>	Simple framework	250,000
<b>h)</b>	Ecosystem, Tracking (related)	600,000
<b>i)</b>	Surveys	1,500,000

*In some cases, depending on the issue and its scope (e.g. software application) the specific assigned cost is slightly altered.*

### 14.13 Detail Cost Estimates

NO	ACTIVITY	ESTIMATED COST
	<b>PART A- INCREASING ICT WORKFORCE SIZE</b>	<b>A</b>
a)	Creating a critical mass of ICT professionals and knowledgeable workforce;	D1,000,000
b)	Develop leaders and talented employees at all levels to help achieve operational success	D2,250,000
c)	Talent management by maximizing employee talent through recruitment, outreach, hiring and retention;	D3,650,000*
d)	Supports a culture of leadership and continuous learning through ICTs;	D3,600,000**
	<b>Sub-Total Estimate</b>	<b>D10,500,000</b>
	<b>PART B – ENSURING WORKFORCE PRODUCTIVITY</b>	<b>B</b>
a)	Strategic alignment and integration of HCD Plan into Government workforce planning	2,450,000
b)	Enhance the diversity of civil service workforce through partnerships	D1,700,000
c)	The auditing and evaluation for achieving best practice standards	D3,150,000
d)	Having a results-oriented performance culture	D7,500,000
e)	Government in ICT skills acquisition for sustaining workforce needs	D33,900,000***
f)	Ensuring accountability by monitoring and evaluation	D1,600,000
g)	Risk Management and Mitigation Strategies	D1,950,000
	<b>Sub-Total Estimate</b>	<b>D49,800,000</b>
	<b>MAIN TOTAL ESTIMATE</b>	<b>D60,300,000</b>
	<i>*There will be the exercise of putting in place an exit survey tool to identify cases and reasons for attrition of ICT staff.</i>	
	<i>**There will be evaluation of the current training and development programs of the government, the acquisition of knowledge management tool and the identification of internal and external learning opportunities for all employees, using a variety of learning tools.</i>	
	<i>***There is ICT skills acquisition through training of at least 50 special-skills ICT personnel by the year 2024. (35 local training and 15 overseas)</i>	