



## **INFORMATION AND COMMUNICATION TECHNOLOGY (ICT): A VERITABLE TOOL FOR NATIONAL DEVELOPMENT**

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### **ABSTRACT**

*The need to access or utilize ICT facilities/gadgets by all the stakeholders for national development hence ICT is highly needed virtually in all the sectors of the economy and globally. The world of business is gradually heading toward paperless offices and transactions. This paper explored the meaning of ICT and its facilities/gadgets, importance of ICT benefits and challenges that hinders effective utilization of ICT facilities/gadgets in the business cycle and environs, need for ICT and national development, stakeholders and ICT need/utilization, and office machines (equipment)/ICT gadgets. The paper concluded that ICT facilities/gadgets contributed immensely to virtually all sectors of the economy and to various stakeholders in the execution of their duties and transactions. It was recommended that constant power supply should be maintained in the economy to enable the stakeholders execute their business operations, and various stakeholders should be trained and retrained by government in the usage of ICT facilities/gadgets.*

### **Introduction**

Information and communication technology (ICT) is derived from three concepts namely information, communication and technology. When these concepts are jointly used it is known and addressed as information and communication technology (ICT). Information and communication technology as widely no is globally used in virtually in all sectors of life. Before delving into the definition of this ICT, the various concepts attached to make it term has to be discussed.

Information according to Anderson (1991) is defined as the structured data such as collections, storage, facts, dissemination, messages, comments, and procuring of news, needed to react knowledgeably for necessary or appropriate decisions. Communication could be facts, news, messages. Communication is human activity that involves an interaction on the mental and physical plans. Communication can be oral, written by means of using symbols or electronic gadgets such as telephone, e-mail etc. On the other hand, technology according to Nwosu (2003), rested its base on computer, telecommunications and semi-conductor services and is equipment which variously manipulates stores and communicates data electronically. Information and communication technology is the acquisition, processing, creation, storing, and dissemination of pictorial, vocal and textual information through sophisticated medium, equipment and technologies. Umoke and Esheya (2015) described ICT as the sets of telecommunication devices that accept data, process, store, retrieve and transmit information electronically. ICT mediums whereby information could be sourced include internet or World Wide Web (WWW), interface with radio, cable and television, video, cellular phones, print media etc.



In the Nigerian economy, information can be widely assessed in the areas of industries, marketing, accounting, secretarial duties, medical/hospitals, financial institutions, administrative duties, governmental sector, homes/business offices, individuals, students, churches, hotels among others. According to Umoke and Esheya (2013) in Umoke and Esheya (2015), ICT facilities cover internet service providers, telecommunication technology equipments and services, media and broadcasting, libraries and documentation centres, networks based information services and other ICT related areas. Since acquisition of ICT knowledge is a recent trend among the society, there is need for all individuals (like students, teachers, parents, employers, employees, creditors, debtors, lawyers, doctors, government, market men and women) to be conversant with the ICT application in the aspect of data processing, storing and transmission of information.

It is to this extent that developing nation like Nigeria must decide to look inward on how to gear individuals, students, publics, teachers, parents, bankers, lawyers, doctors etc, towards the practice of ICT and experiences by empowering them for future sustainability. All available talents in this country are to be encouraged and tailored towards ICT compliance in schools, banks etc.

There has been a debate over the years on how the ICT facilities are being utilized in conducting business activities and its sustainability. Some reckoned a success while some failure.

The success of any organization according to Akintonde and Ekechukwu (2013) depended to a large extent on its adaptation to the technologically compliant society that is referred to as information society. Therefore, this study was grouped and arranged thus;

- Meaning of Information and Communication Technology (ICT)
- Concept of National Development
- Stakeholders that needs Information and Communication Technology (ICT) for national developments
- Office Equipment (Machines) used by various Stakeholders for National Development
- Information and Communication Technology (ICT) Applications
- Functions/importance of Information and Communication Technology (ICT)
- Importance of Information and Communication Technology (ICT) for National Development
- Information and Communication Technology (ICT) Need/Usage for National Development

### **Meaning of Information and Communication Technology (ICT)**

Information and communication Technology has been defined by different authors/scholars in different ways. The term information and communication technology according to Akintonde and Ekechukwu (2013), are computers, ancillary equipment, software, hardware, services and resources bought together to form network for automatic acquisition, storage, manipulation, management, movement,



control, display, switching, interchange, transmission or reception of information or data. Information which is a processed data made available to all concerned individuals that need to assess such information. Information technology involves manipulation, acquisition and dissemination of through sophisticated machines used to transfer data. This information technology metamorphosed into information and communication technology ICT. Olowookere and Iyiola (2015) posited that ICT is a concept which is used to describe the strength and divergent use of computer and telecommunication devices for data and information interchange involves the processing, storage, selection, transformation and dissemination of data via vocal, pictorial, numerical and symbolic information.

According to Enyekit, Owaji, Obayo and Enyekit (2015), ICT is the system that is used in processing, storage and transfer of information which can be audio, visual or both in the form of numbers, letters and pictures. To Utoware, Kren-Ikidi and Apreala (2015), ICT are represented by tools like computers, internet and intranet, general system of devices and mobile technologies. From the definitions of ICT above, the author is of the view that ICT is the means of transmitting of information via vocal, symbols, pictorial and electronic gadgets such as e-mailing and messages, internet and intranet using search engines, computer software (e.g. word/data processing, graphic, power point and accounting packages such as peach tree, spreadsheet), yahoo, Google, in the past the world was going traditional office, but today we are in the era of paperless office as a result of ICT.

### **Concept of National Development**

Before the discussion of national development, there is need to explain the meaning of development. According to Ezeuwa (2009), development is a dialectical concept seen as the use of human resources to qualitatively change man's physical and biological environments to his benefits or seen as involving the introduction of new ideas into the social structure and causing changes on the patterns of organizations and the social structure. Azuka (2009) defined development as increasing the production system of a nation population, reducing poverty, creating employment and creating equality of opportunities and increasing the welfare of all social. On the other hand, Ohakwe (2009) described development as:

- Event causing change: an incident that cause a situation to change or progress.
- Process of change: the process of changing and becoming larger, stronger or more impressive, successful or advanced or of causing something to change.
- A specified stage of growth or advancement.
- A new product or idea.
- An event constituting a new stage in a change situation.

However, development is an improved efficiency in making changes or adaptation of individuals in becoming successful or in achieving success in the society.

National development according to Ezeuwa (2009) refers to positive growth, modernization and a function of change towards economic, social and cultural conditions of different communities' status and ethnic groups of the country. These

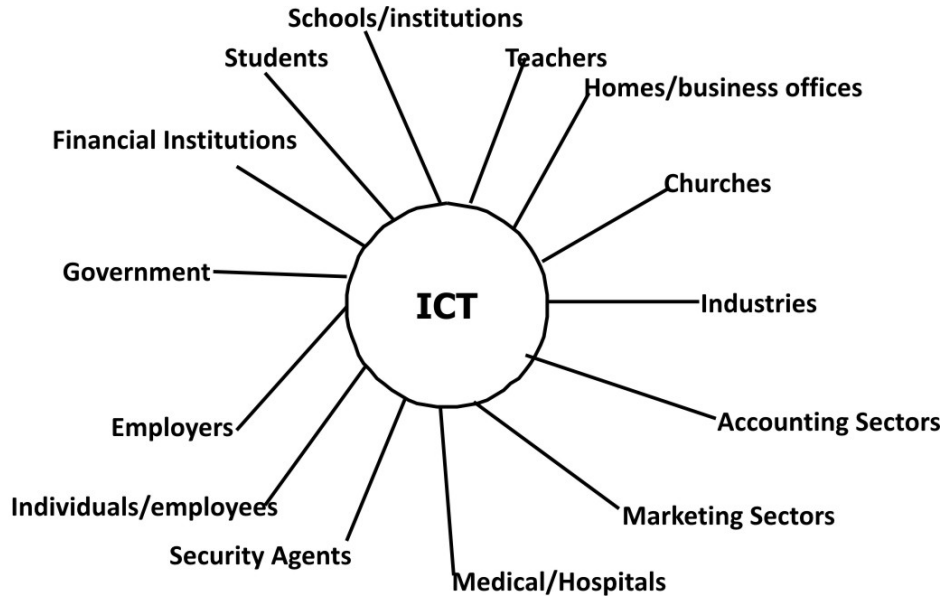


changes could be achieved through the joint efforts of the people and government of a nation. Azuka (2009) added that national development is a multi-dimensional process that involves the economic, social and political systems of a nation. Therefore, national development connotes the joint efforts of individuals and government to make changes or improve the economic, social, cultural, political and physical well-being of a nation or society at large.

National development attracts a lot of benefits to the people and government of a nation. Though, benefits accrued differ on the individual exposure. That was why Ezeuwa (2005) argued that a modern man emerges with different characteristics from that of a traditional man in terms of been open to new experience, be a good planner, aspire to glamour to higher level, have good and proper orientation, not being dependent rather make things happen, accords respect to other individuals, and being advantageous of controlling his environment. However, if one is a good citizen of a developed nation he/she should provide democratic values needed for his survival and as well as his nation, grow in status and also contribute ideas that is viable to the economic life of the nation. Hence, national development reduces to the barest minimum unemployment, poverty and inequality due to its reflection on the standard of living, education, technology and welfare of people in the society. Also, it leads to stable economy, political stability and socio-cultural changes that will assist the nation for comfortable living. As changes occurred as a result of national development it also changes the technological mindset of the society as this is the bed rock of this study.

Overcoming the problems of unemployment, poverty among others demands effective use of some natural resources such as land, labour, production and capital. In order to improve the basic standard of living conditions of people in the society, national development could be sustained through the improved good health, general infrastructures, and educational improvement, improvement of unemployment conditions and technology and environment. One way to contribute to national development is through ICT compliance in all sectors of life and the economy at large. The increase of ICT usage has become an international phenomenon in the past years, it started as a concern for some computer literate people but now it has become a norm and way of life for people globally. Therefore, there is need for all hands to be on deck in order to tackle these challenges posed in adapting to ICT environment.

### **Stakeholders that Needs Information and Communication Technology (ICT) for National Development**



**Figure 1**

### **Office Equipment (Machines) used by various Stakeholders for National Development**

Eze (2015) opined that computer and its accessories is the vital tool used in information and communication through the internet, e-mail, e-commerce, e-banking, webcom, power point presentations, teleconferencing. The author noted that paperless offices are invoked these days as arecent trend in the society. With different office machines, information can be disseminated effectively to various recipients. Supporting the above views, Asonibare (2015) enumerated the ICT equipment and machines that constituted the new trend in ICT application in a modern offices thus;telex, facsimile (fax), collecting, teleprinter, photocopying, shredding, franking, laminating, duplicating, telephone, printer, projector machines, global systems for mobile communication (GSM) and scanner which could be used in scanning a cheque, electronic signature, medical cards, ID cards, passport (International), business cards and documents of all types.Asonibare also noted that the internet facilities is useful for communication, office activities, search for jobs, services, researches, chats exchange businesses, public relations, e-banking, e-education, e-registration, e-payment, e-result, e-library, e-shopping. However, machines of all sorts could be of help in assessing information in various human endeavours.



### **Information and Communication Technology (ICT) Applications**

As the traditional practice of keeping records has been replaced by paperless electronic office, the demand of business environment has also increased with its dynamic and sophisticated nature. A large number of individuals, bankers, academic, employers/employees, students, civil servants, industrial personnel, marketers, publics, etc who were trained before the advent of computer, were now found in schools, colleges, universities, even business centres as to make themselves available and conversant with the new trend in ICT facilities such as computers, internet and intranet, e-mailing, word processor etc. ICT facilities/gadgets are virtually utilized in all works of life: such as education, banking, industries, research, military, medical services, recording of accounting data (sales, purchases, pay rolling), banks, educational institution, industrial organizations, construction companies, accounting firms, communication companies etc wants their employees to have basic computer skills because their organization become ever more dependent on computers/ICT tools (Onwuachu, 2013). In consonance with the above assertion, Asonibare (2015) affirmed that ICT application affects many aspects of our lines and as such it has penetrated into office, factory, home, bank, transportation system and many other areas of human endeavour. Business needs to meet the demands of their employees and customers as a result of emergency of ICT tools as to allow a greater access to systems and information.

### **Functions/importance of Information and Communication Technology (ICT)**

ICT performs many functions in our society. These functions according to Olowookere and Iyiola (2015) include;

ICT facilitates the acquisition and absorption of knowledge, offering unprecedented opportunities to educational systems.

- It promotes learning resources through internet and World Wide Web (WWW).
- ICT also prepare students to be ICT competent for a work place and increasingly globalizing job market.
- ICT motivate individual to learn ICT facilitated gadgets like television, videos and multi-media computer.
- It facilitates skills acquisition, high order thinking and creativity.
- It improves access to quality information and dissemination to various recipients.
- ICT provides conducive learning environment for both the teacher and the learner by promoting active, collaborative, creative, integrative and evaluative learning.

However, ICT provides opportunities for e-marketing and e-banking. All classes of individuals due have access to ICT via computer provided the skills and knowledge are acquired.

On the other hand the importance of ICT cannot be overlooked.



### **Importance of Information and Communication Technology (ICT) for National Development**

According to Ibrahim (2015) the importance of ICT are to:

- provide easy access for learning materials/resources.
- make distance learning materials easily accessible
- Access to on-line libraries
- provide authentic and current information
- reduces time on many routine tasks
- provides educational data storage
- Collaborative, anytime, anywhere learning
- Multimedia approach to education
- Better accesses to children with disabilities

Omotayo and Umoru (2015) noted that the importance of ICT are, thus;

- ICT enable individuals to learn with ease, speed, and accuracy of academic work.
- Facilitates less teacher led approaches and enables students to work more autonomously.
- ICT facilitates working processes and improves resulting products.
- It made various types of modification much easier.

### **Information and Communication Technology (ICT) Need/Usage for National Development**

As we are now in technological era, there is need for an individual to comply with the new for survival. In the labour market employees were expected to exhibit different business skills in the areas of accounting, secretarial, marketing, and the other business related skills. The ability to use computers has become an essential part of everyone's life that the demand for ICT literacy is increasing in Nigeria, because employees and employers realized that ICT enhances job efficiency. Everyone needs to do their jobs by ICT.

With high level demand for ICT literacy and other ICT gadgets, it is now a concern for all individuals and professionals to become ICT literate. Series of electronically operated machines are invented as to enhance communication in this modern age; ICT is meaningless without human factors and human were to operate these ICT facilities. This was why Akintunde and Ekechukwu (2013) noted that as the demand of the business environment increased with the dynamic and sophisticated nature, the executive functions have widened and employees job are challenged more.

Ibrahim (2015) posited that ICT facilities/gadget is needed thus;

- As education is a lifelong process it could be access anytime and anywhere.
- Since information explosion is an ever increasing phenomenon there is need for one to have access to this information.
- Education should meet the needs of variety of learners as such it is important in meeting this need.
- Society at large required individual to possess technological/ ICT literacy



- In order to eradicate the challenges of illiteracy and poverty in our society, ICT should be embraced.

Buttressing the above assertion, Umoke and Esheya (2015) added that the challenges of training and re-training of employees of various organizations towards increasing their knowledge, skills in ICT application has brought about the need for the acquisition of ICT skills by individuals. Onwuachu (2013) posited that the need for ICT skills include using of computers and internet access in schools for all the individuals to have equal and ready access to the skills of effectively using this technology. The author added that these days, computers are just as common as pen and paper for writing especially among the youths. This is because there seems to be an inversely proportional relationship between computer literacy and compositions literacy among the world computer users. As computer applications are highly needed in our society today, many seems to communicate with computers hence computers are preferred over the pen, paper and manual typewriters because of their inability to duplicate, edits or retain vital information over a time while computer does all these thing therefore reverse is the case.

Also, in terms of recruitment in our society today, computer literacy is considered to be a pre-requisite skill to possess for recruitment in Nigeria. During the interview, process, individual participants are required to knowledgeable in operating ICT tools as to meet up with the sophistication of modern office equipment.

### **Challenges of Information and Communication Technology (ICT)**

Since the inception of ICT machines/gadgets in the world of business, it has been faced with lots of challenges. According to Gbadegesin (2015) and Eneogwe (2015), the following problems are encountered in the utilization of ICT facilities, thus:

- lack of computers
- high cost of ICT equipment/facilities
- lack of qualified teachers/personnel to teach ICT in schools
- inadequate funding of ICTs projects,
- poor ICT policy regulation
- lack of internet or slow connectivity,
- poor electricity supply.
- computer viruses,
- reliability of information,
- reliance on technology, lack of privacy and job security

### **Conclusion**

ICT facilities/gadgets play a major and important role in assisting various stakeholders in the execution of their various duties and needs. Employers/employees, institutions/teachers/students, parents/families, hospitals/doctors/nurses, accountants, secretaries, etc, should strive to exploit, explore and constantly utilize ICT facilities/gadgets in the execution of their duties. As we are now in the era of technological advancement which is characterized by global competitiveness, it



becomes expedient for every stakeholder to be ICT compliant, hence the success of any business transaction depends largely on the acquisition of ICT skills and the levels of its application.

### **Recommendations**

The following recommendations were made:

1. Government at all levels should establish ICT centre and as well endeavour to expose various stakeholders to the importance of ICT facilities/gadgets and usage in carry out their functions as to facilitate business transactions.
2. Institutions should educate their students for proper use of internet facilities/gadgets, network, ATM, e-mail, facebook, and other communication devices.
3. Teachers at various levels of education should be trained and retrained on the use of ICT facilities/gadgets because of ever changing nature of technologies.
4. Stakeholders should utilize modern technologies hence it is the only effective and efficient means of communication in this technological era.
5. Government at all levels (federal, state and local) and stakeholder/philanthropist should provide relevant modern ICT facilities/gadgets to all ICT centres established and at all levels of educational systems.

### **REFERENCES**

- Anderson, R.G. (1991). Data processing and management information system.
- Akintonde, G.O and Ekechukwu, B.N. (2013). Evaluating the level of efficiency of secretaries in coping with polytechnic, Owo, Ondo. *Journal of Business Educators of Nigeria (Ondo and Ekiti States Chapter)*, 2(2), 9-17.
- Asonibare, E.M. (2015). Information and communication technology (ICT): A strategic tool for sustainable development. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 241- 246.
- Azuka, B.E. (2009). Reshaping Nigeria's environment for national development: The Polytechnic perspective. *Business Search: Journal of School of Business and Management Technology, Federal Polytechnic Nekede, Owerri*, 1(1), 1-9.
- Gbadegesin, A.A. (2015). Problem of full utilization for using ICT/internet services in teaching business education course, *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 276- 281.
- Eze, O. (2015). The imperatives of new technologies in teaching and learning process in business education in the tertiary institutions in Nigeria. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 322- 392.
- Ezeuwa, L. (2009). Effective management of teacher education: A panacea for national development. *Business Search: Journal of School of Business and Management Technology, Federal Polytechnic Nekede, Owerri*, 1(1), 101-105.
- Enyekit, E.O; Obayi, A.U & Enyekit, K.E.O. (2015). Extent of instructional material usage for ICT application in business programme in Rivers State



- Universities. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 176- 182.
- Ibrahim, F.J.(2015). The impact of new technologies for instruction and practice in business education in a changing world. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 207- 212.
- Ohakwe, S.N. (2009). Business environment: Office Technology and Management (OTM) curriculum standards and national development. *Business Search: Journal of School of Business and Management Technology, Federal Polytechnic Nekede, Owerri*, 1(1), 10-20.
- Onwuachu, R.N.(2013). Achieving quality assurance in teaching and learning business education in Colleges of Education through the use of information and communication technology (ICT) skills. *Association of Business Educators of Nigeria (ABEN) Books of Readings*, 3(1), 171-176.
- Olowookere, S.O and Iyiola, M.A. (2015). Application of information and communication technology (ICT) in the teaching of business education subjects. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 48- 56
- Umoke, C.C. and Esheya, S.E. (2015). Information and communication Technology (ICT) facilities: solution to the problem of digital divide among students in public secondary schools in Nigeria. *Journal of Research in Science and Technology Education (JORSTED), ESUT, Enugu*, 5(1), 1-5.
- Utoware, J.D.A; Kren-Ikidi, C.P & I.O, Apeala .(2015). Issues and trends in the application of new technologies in teaching business education in Nigerian universities in South-South States. *Association of Business Educators of Nigeria (ABEN) Conference Proceedings*, 2(1), 207- 212.