

Gentle Breeze of Digitalization Blowing in the Urban Lifestyle: A Case Study of Bangladesh

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Received: 10 June 2015 Accepted: 30 June 2015 Published: 15 July 2015

Abstract

The aim of this study is to observe the current state of ICT (information and communications technology) in the urban areas of Bangladesh as well as make some recommendations for the shortcomings of e service in urban areas in Bangladesh. Data were collected from the various journals of Bangladesh government as well as English newspapers, although the study is mainly descriptive in nature. The study finds that Bangladesh has made progress in the urban lifestyle regarding Computer training, e-Insurance , Banking facilities, Payment of rural electricity bill facility, Health services, Creation of jobs, Union digital center Blog, District e-service center -settlement record, National e-service system (NESS),Life and earning oriented national e-information book having life and earning oriented data, Mobile Key-pad and the opening of SMS in Bangla, My alphabet, National portal framework and website, Multimedia class room and digital summary,E -book ,online application management of non govt.Keywords: ICT (information and communications technology), union digital center, payment of rural electricity bill facility, district e-service center -settlement record and payment of rural electricity bill facility.

Index terms— ICT (information and communications technology), union digital center, payment of rural electricity bill facility, district e- service center

1 I. Introduction

igital Bangladesh” is an integral part of the government’s Vision 2021-which promises a prosperous and equitable middle-income Bangladesh by its golden jubilee (50 years) of independence. The government of Bangladesh has launched a large number of projects relating to digital technologies and a number of these are already Author : Additional Deputy Commissioner, Rangpur. Government of the People’s Republic of Bangladesh. e-mail: mustain15166@gamil.com underway. National ICT Policy-2009 was developed with a view to achieve middle-income status by 2021 and developed status by 2041.

‘The Information Technology centered world is going ahead fast. Inevitably, Bangladesh will have to go forward with this pace’-this eternal realization is being felt by all concerned in the field level administration. Keeping the demand of time in view, a master plan was launched half a century ago with a view to building digital Bangladesh. Now, both the administration and civil society have been enlightened with the outcome of that plan. Administration is working for the purpose of bringing the services of digital system to the doorsteps of common people. At the same time, common people have also responded to take utmost services utilizing the privilege. Now, most of the office bearers no longer have to wait physically to get permission to approach the office executive with files of documents bound by red tape. Through the help of information portal as well as e-information services, scanned copies of all files are stored in the online account of the office executive. Even in the daily busy programs, a person sitting in the car or elsewhere, can come to know of the government programs, take decision , express opinion or give direction by sending them to the officials concerned. The office can notice

constantly how many files are not processed on time by the officials. In between other activities one can observe the daily progress of public services performed by field level administration. This change is not merely confined to the office executive as well as internal officials. Its scope extends from the head of the government to the fields of farmers living in remote villages. And the only medium of building linkage of this extensive flow of services is Union Digital Centre, which was launched in the name of Union Information and Service Center-UISC.

Union Digital Centre is a joint project of the local government department of the people's republic of Bangladesh and access 2 information (A 2I). It is constantly monitored by district and upazila administration. On 11 November 2010, the honorable prime minister of the people's republic of the government of Bangladesh, Sheikh Hasina and UNDP's executive Miss Helen Clark inaugurated the Union information and service Centers through a video conference. The main objective of Union Digital Centre is to promote union parishad council to a strong institution in order that this institution, within the year 2021 can play a positive role in establishing information and knowledge based country. At the same time, this center can play a far-reaching role in bringing government, nongovernment information and services to the common people in eliminating technological disparity and linking all the citizen with the modern system of information flow.

As a result of the establishment of Union Digital Centre (UDC), the common citizens are now getting 60 types of public and private services easily, cheaply, and uninterruptedly. Since the establishment of UDC, about 11 crore services have been provided and the organizers have earned about 5 crore taka in a month by giving these services. Through the establishment of union information and service centre (UISC), the management of getting information and services for common people of the country's 4 thousand 5 hundred 16 villages has been already been ensured. From the service centers of the villages, at present, on an average, 45 lac People can get variety of information and service every month.

From union digital centers (UDC), the people of the union concerned are easily getting the following public information services: Government forms, notice, passport, visa related information, national information, law related information, job news, citizen certificates, results of public examinations, land settlement record, repayment of electricity bill, university online admission, online birth and death registration, VGF, VGD list, common citizen application, agriculture information, health counseling, mobile banking, computer training, taking photos, internet browsing, email job information compose, British council English learning, application for visas and tracking, video conferencing, printing, scanning photo copies laminating and so on.

Apart from traditional services, at present prayers from union digital centers for mobile banking, life insurance, soil test and recommendation for manure and prayers from the Deputy Commissioner's office to get settlement record are available. Now through mobile banking everyday on an average, transaction of more than 15 crore taka is being done from 2 thousand seven hundred 73 centers.

In most cases, money is going from towns to villages through it. The money flows from abroad to towns and towns to remote villages. Trades and business and also financial system are being strengthened. 2363 union digital center's insurance benefits of Life Insurance Corporation have been introduced so far. Some days back, online registration of 14 lac agricultural laborers intending to go to Malaysia was completed.

The role of union digital center in eliminating poverty is indispensable. Union digital center is playing an important role in reflecting the good effects of 89 social security network programs taken with a view to saving people of all ages, either children or old from the grip of poverty in the life style of citizens.

It is to be mentioned that in the statistics of the year 2014, the poverty rate of the whole country was 25.6%, and of them the extreme poor people were 12.4% with the gap of the last two decades, in spite of the decrease compared with the percentage, yet 4 crore people are regarded as poor in consideration of their number. In order to reduce poverty the government has started various social security programs such as, VGD, FGF, EGPP. However, distinguished people think that lack of coordination is a barrier to the complete success of these programs. To remove them they have suggested further emphasizing planning of middle life standard for common people and establishing good governance including stopping misuse.

II. Objectives of the Study

The objectives of this study are as follows: 1. To observe the current ICT (information and communications technology) status in urban area of Bangladesh.

3 To show the sector wise achievements of Union

Digital Centre in urban area. 3. To find out the problems by the digital system as well as give some recommendations.

4 Literature Review

A very few literatures have been found that directly and comprehensively cover Gentle Breeze of digitalization blowing in the urban lifestyle: a case study of Bangladesh.

A study conducted by World Bank (1996) shows that access to mobile and internet service at a reasonable price creates employment, increases productivity and increases exports. Bouman (1989) described the rural finance policy, main features of informal rural economy as well as its problems and weakness etc.

Aman ?llah (1998) shows that how Information technology makes socio-economic development as well as and cultural development which brings social change. Journal of Dhaka University on June ??2000) demonstrates that how digital system that is internet plays a vital role in the market system.

Annual journal of BARD December (2007) explains the necessity of digital communication (community radio) which helps to make radical dynamic change in the economy of Bangladesh.

5 Year 2015

There is an article published in The Daily Star ??10-03-15) named as "Digital Bangladesh: Dreams and reality" which shows the status of ICT ranking among the world as well as achievements of digital Bangladesh.

6 III.

7 IV. Methodology of the Study

This paper is based on secondary data which were collected from the various reports such as draft of 7th Five Year Plan (7FYP), Finance Division, Ministry of Finance (Journey towards a Digital Bangladesh) and journals as well as practical experience of descriptive and graphical analysis were done with the collected data to achieve the objectives of the study. Microsoft Office and Microsoft Excel package have been used in graphical representation of data.

8 V. Sector wise Achievements of Union

Digital Centre

Bangladesh has made progress in the area of Computer training, e-Insurance , Banking facilities, Payment of rural electricity bill facility, Health services, Creation of jobs, Union digital center Blog, District eservice center - settlement record, National e-service system (NESS), Life and earning oriented national einformation book having life and earning oriented data, Mobile Key-pad and the opening of SMS in Bangla, My alphabet, National portal framework and website, Multimedia class room and digital summary, E -book ,online application management of non govt. teacher's employee's welfare trust and retirement benefits, epurgi, Learning and earning, online tax calculator and online tax returns preparation, Electronic money order and postal cash card, services on mobile phone , digital innovation fairs and WSIS awards etc. which are described as follows:

9 a) Computer training

Offering computer training is one of the important services of union digital center. With a view to building a technology based society this endeavor is essential. At present, three thousand seven hundred seventy three union digital centers are giving computer training at low cost using multimedia projectors. From November 2010 to December 2014, almost 52 thousand students and youths have got computer training.

10 b) Insurance

In order to send insurance benefits to rural people, government life insurance corporation has started life insurance policy in the country's 2 thousand seven hundred 68 union digital centers. Through it, about 60 thousand citizens have got benefits so far.

11 c) Banking facilities

In order to send banking facilities to the deprived grassroots people , four banks (Dutch Bangla , Trust Bank, One Bank, and BIKASH) have launched mobile banking programs at the country's 2 thousand 3 hundred 63 union digital centers .

12 d) Payment of rural electricity bill facility

To provide services to the doorsteps of mass people, Bangladesh Rural Power Development Board (REB) has managed the system so that marginalized people can submit rural electricity bill through 727 UDCs till now.

13 e) Health services

For the purpose of giving health care to these rural people deprived of health care, with the support of health directorate, at present 3 UDCs tele-medicine centers have been started. In addition, health camps have been started at about more than 500 union digital centers. Within a short time, telemedicine service will be opened in the rest of the UDCs.

14 f) Creation of jobs

The union digital centers organizers have made the UDCs effective. Two organizers work at each UDC, one of them is male and the other is female. As there is a female organizer, women's easy access to the center has increased. At the union digital center, the organizers are not employees but investors. The organizers live on the

income earned through giving services to common people. In other words, at 4 thousand 5 hundred 47 centers, total 9 thousand 94 young ICT organizers have got the opportunity to be self employed which has also ensured women's empowerment.

15 g) Union digital center Blog

Digital Blog has been started so that the UDCs organizers of all unions can share the invention, opinion, problems and their solutions. By this time, the blog has earned a lot of prize from home and abroad. At present, there are 13 thousand 5 hundred members at this UDC blog including organizer, field level administrative officers, public representatives, secretary and ministers. At the blog, the number of total posts is more than 1 lac 20 thousand.

16 h) District e-service center

On 14 November, the honorable Prime Minister Sheikh Hasina and UN secretary general Ban ki Mun jointly and friendly inaugurated e-service center program in all the districts of the country. Through district e -service center, people can apply for services directly by post or online process. As a result, apart from improved services, services are given and taken at any time and place. If applied, the applicant is given a receipt. So in terms of giving services, accountability has been ensured. According to project authority, all the transaction of any district administration are being done through online system till now. More than 9 lac citizens' applications have been settled through online system. So the district e-service center being opened, harassment of people has been stopped and time, labour and money are being saved. Besides transparency, dynamism and accountability are noticed in the activities of officers, employees of administration.

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17 d) Payment of rural electricity bill facility

To provide services to the doorsteps of mass people, Bangladesh Rural Power Development Board

18 i) E -settlement record

Through this process and easy online application, duplicate copies of different records of land (CS, SA, BRS) settlement record, ledger book, and certified copies are being provided from the record room of DC office. Therefore, people are getting rapid services without any harassment. On the other hand, supplied records are being digitalized automatically. Until now, 14 lac 50 thousand records have been given through online process and 2 lac 50 thousand records have been given through UDC.

19 j) National e-service system (NESS)

With a view to transforming the services provided from Bangladesh's all directorates, districts, upazilla level government office into e-service, nationally a unilateral co-ordinated e-service platform has been made. It is known as national e-service system (NES). Through using this platform all the institutions concerned will be able to supervise immediately various stages of giving services to citizens could progress. Of e-service system, the remarkable tasks are e-filing, e-form, e-communication, e-service management, govt. : directory, access services , edirectory, national e-service portal, citizen web account, e-notification and NES web service. There is a plan to open e-service system in the country's 16 thousand government offices by turns. About 16 thousand officials, employees will use it there. With the support of this system, more than 4 hundred services will be transformed into e-service.

20 k) Life and earning oriented national e-information book having life and earning oriented data

To find out life and earning oriented information easily in a place, a national e information dictionary, the biggest information kosh in Bengali, has been opened (www.infokosh.gov.bd). In national e information kosh , information in Bengali is written regarding agriculture , education, health, law and human rights , travelling , employment , citizens services , non agricultural endeavor , environment and disaster management , trade and industry , science and communication technology and so on. \This information is available as text, animation, picture, audio and video. In the national e-information kosh there is one lac page of information on 10 thousand topics now. Three hundred 50 government and non government organizations are working in a body to compile and develop the national e information kosh. Until January 2013, 10 and half lac people took different data from the national e-information kosh.

21 l) Mobile Key-pad and the opening of SMS in Bangla

In order to ensure facilities through information technology for the larger population, the importance of using information technology in Bengali is very essential. For this reasons, Bengali keypad, suitable for the use in mobile phone, has been provided so that common users of mobile phone can easily send and read SMS in Bengali from their phone sets of different brands. Besides, since 31 January 2012, import of any type of mobile phone

except Bengali key pad has been banned. At present, introducing Bengali key pad suitable for smart phone is going on.

22 m) My alphabet

Keeping common people's demand in view, measures have been taken to prepare Unicode facilities-My Alphabet and it will be open to all. Now a days, despite having more than one font to practice online Bengali in the country that has been prepared without direct or indirect approval of Bangla Academy.

23 n) National portal framework and website

The work of making of about 23 thousand portals has been ended for the country's unions, upazilas, districts, division, directorates, ministries and other offices. The making of website of 24 thousand government offices has been completed. In the March 2013, it was completely opened. As a result, by introducing portal at any office, people will easily get information and services.

24 Multimedia class room and digital summary

'No learning information technology, rather information technology in education-keeping this guiding principle in view, two models, named making multimedia class room' for teachers and learners and making digital content by teachers have been invented. Many developing countries have expressed their willingness to follow these models of Bangladesh. Making contents suitable for learners, trained teachers are using them in the class rooms. These contents made by teachers have been stored in a blog named www.ictinedubd.ning.com. Other teachers are using them when required and are playing a role developing its qualitative standard. Now under this project, the works of setting up multimedia class rooms in 20 thousand 5 hundred secondary and higher secondary institutions of Bangladesh will have been set up. If the class rooms were conducted by multimedia class rooms, our new generation would get quality education. As a result, they will be able to make themselves prepared to face global challenges. According to A2I authority, almost 70 lac learners are supposed to be directly benefited by this.

25 p) E -book

With a view to making text books interesting, attractive, effective and suitable for modern times, 3 hundred 25 text books of primary, secondary, madrasa and technical education boards and more than one hundred reference books have been transformed into e-books. On 24 April 2011, the honorable Prime Minister Sheikh Hasina formally inaugurated e-books. These books can be read, downloaded and printed from the website www.ebook.gov.bd. The use of e book and publications is highly flourishing as the computer, mobile phone, e book, I pad and cds are easily readable to the readers. Till now, 11 lac have been using e-book site. q) Online application management of non govt.

teachers employees welfare trust and retirement benefits For the purpose of ensuring trouble free retirement benefits of non government teachers and employees, online application system has been introduced in non government education trust and retirement benefits board. In the 6 March 2013, the honorable Prime Minister inaugurated online application system of non government institution teachers, employees welfare trust and retirement facilities. Using this service, 6 lac teachers and employees of non government institution can apply for retirement benefits.

26 r) E-purgi

All the sugarcane growers of 15 sugar mills of Bangladesh are now getting information through SMS. As a result, long time harassment of the growers has come to an end. Side by side, sugarcane is being supplied at the mill gate in time. Consequently, the production of sugar mills has increased. As a result, of the introduction of e-purgi, every year, more than 2 lac laborers are being directly benefited. So far, more than 20 lac purgi information have been issued by online system. On December 12, 2010, the honorable Prime Minister Sheikh Hasina formally inaugurated e-purgi system. In 2009, with the efforts of A2I program, e-purgi was introduced, on test basis in the sugar mill of Faridpur and Jhinaidah.

27 s) Learning and earning

At present, through the use of the information technology. Online outsourcing is playing a significant role in creating employment. A group of youths of the whole country, having been linked without sourcing work, are earning foreign currency. Based on this reality, under access to program and in the principles of government and non government partnership, learning and earning programs have been taken up. Through this program, the learners of schools, colleges and universities are being made capable of earning by giving them training on outsourcing. Mean while, 2 thousand learners of 15 districts including Dhaka have been trained in this regard.

28 t) Online tax calculator and online tax returns preparation

Through this system, it is possible to bring out the accounts of income tax and prepare income tax returns. Until now, more than 2 lac 23 thousand tax payers have prepared income tax returns with the help of this system. In

addition, from this year onwards , taxes are being given through online service too. So far, 1 thousand 9 hundred citizens have paid taxes amounting to more than 1 crore taka through online service.

29 u) Electronic money order and postal cash card

Bangladesh postal department has launched electronic money order from their 2 thousand 7 hundred 50 post offices. With the help of this postal service and mobile phones, money can be sent and received within highest 1 minute from these post offices. Previously, it took 3-7 days to send a money order. In the last 3 years, almost 94 lac clients have got this service. Within this time limit, transaction of a total of 4 thousand 3 hundred 98 crore taka have been done. The postal department has earned 54 crore 78 lac taka fiscal income by giving this service.

Postal Cash card is a kind of debit card conducted by Bangladesh postal department. With the help of this card, clients can deposit money into his account, draw it on requirement and send it to other card bearers and shop from a definite outlet. If an account is opened by giving taka 45, there will be 10 taka balance into the clients account. Prime Minister Sheikh, on 26 March 2010, formally inaugurated this program. Now a days, this service is opened in 8 thousand 38 post offices of the country. With the support of this card, apart from giving social allowance of 6 crore taka, transaction of more than 26 crore taka has been done.

30 v) Services on mobile phone

Tele density is one of the indexes of a country's development. Now in Bangladesh, there are almost more than 9 crore mobile users. This rapidly growing technology is now in the hands of the poor village farmers. Mobile phone is not only a device for talking but it is able to give variety of information and services. Keeping it in reality, measures have already been taken up to give services to government and non government levels through it. In the matters of introducing this service, 'access to information' (A2I) project is giving technical support. Some facilities earned by this service are as follows:

Mobile phone is sufficient enough to pay various urban services including electricity , water , gas and so on .So far , more than 2 crore citizens have paid the bills of these services through mobile phone .

Now railway ticket can be bought by mobile phone and online service. Till now, through mobile phone, 5 lac 13 thousand and through online service 1 lac 42 thousand tickets have been sold .

Through it and online services, the results of public examinations are being published. From the year 2010 till now, 6 crore students have got their results from online service and 3 and half crore students have got their results from mobile phone.

Programs for registration for admission test of public and private universities have been introduced through mobile phones. Now, 32 public universities, 4 hundred colleges, and 70 medical colleges (public and private) have introduced this service. In the last 3 years, almost 27 lac students applied for university admission through mobile phones.

31 w) Digital innovation fairs

In order to give conception about e-services and information to mass people where and how these can be achieved, meanwhile, digital innovation fairs have been organized in all the divisions and districts on national levels. These fairs are the best medium of creating linkage between the service providers and receivers and of introducing people with various digital services. From these fairs common people have awareness about present services as well as about future e-services.

32 x) WSIS awards

Bangladesh has been awarded world famous honor because of bringing the government and non government services to the doorsteps of common people through online system and union digital centers. Keeping 150 projects behind, the access to information (A2I) project of the office of the Prime Minister of the government of Bangladesh has got the most prestigious recognition 'World Summit on the Information Society' (WSIS) award, 2014 on ICT sector. This award was given on the category of services to the doorsteps of mass people.

The achievement, mentioned above is the successful outcome of a small word 'digital'. Changing the traditional services of urban services , the dream of building digital Bangladesh has become able to play a positive role in entering the services to the doorsteps of common people cheaply , easily , rapidly and in a transparent and trouble free manner. Not only in unions, but also in upazilas, districts , divisions , ministries everywhere co-ordinated e-service framework is getting stronger gradually .

The digital component has established a strong linkage between the field level administration, service providing institutions, local govt. and mass people. Consequently, the government and the administration are working simultaneously with mutual trust belief and reliability.

33 VI. Conclusions and Recommendations

Bangladesh is facing a lot of challenges to work on implementing E-governance system. This article has identified a number of challenges faced at both government and citizen. This study envisages that the proper implementation of e-governance is a complex and lengthy task that may proceed well beyond the government's target of 2021.

314 From a citizen's perspective, social issues such as lack of awareness, IT literacy, language barriers, and lack of
315 access to the Internet etc. will hinder citizens from using E-government services, while from the government's
316 viewpoint financial and political constraints are the key challenges for implementing E-governance that must be
317 overcome. This paper mainly suggests that government need to establish national broadband network as well
318 as increase IT literacy and internet awareness for the well being of the Bangladesh although the government is
319 trying best to do so. ¹

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