

**Performance of Electronic Money Transfer System (EMTS):
A Study on Government post offices in Bangladesh**

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Dedicated

*To my parents who encouraged me
to walk on the path of knowledge*

Abstract

This study is an attempt to learn the performance of electronic money transfer service (EMTS) of Bangladesh post office from the “user’s satisfaction view point. It tries to understand the performance of EMTS, meaning that is EMTS able to meet its user’s requirements. In other word, do User’s satisfaction relate to the performance of EMTS. And here the performance of EMTS is analyzed in terms User’s satisfaction view point.

Being descriptive cum analytical research study, it has used a combination of content analysis, survey through questionnaire, in-depth interview and used related cases to collect data secondary data also used to meet the objectives of the research. A theoretical concept of Technology Acceptance Model (TAM) by Davis (1989) is employed to establish the relationships between variables. This model theory is relevant to this study because here model explains how users come to post office for electronic money transfer service by using a new technology; which directly effect on the satisfaction of the user’s. The respondents of this study were the service users and the service providers who are closely involved with the service. Data was collected purposively from 60 respondents of Dhaka University Sub post office, Tangail Head Post office and Moulvibazar Head post office.

The collected data was processed and analyzed by using statistical techniques, for example- Statistical Package for the Social Sciences (SPSS) software & MS-Excel. To observe the relationships between dependent and independent variables, Tabulation, cross tabulation and chi-square test and hypothesis test had been performed.

The findings show that all the components of perceived ease of use and perceived usefulness of Technology Acceptance Model (TAM) are associated to the performance of EMTS service. EMTS is easily accessible, EMTS is secured service, its service delivery is quick and users are satisfied with the EMTS. And user’s satisfaction positively influenced the performance of EMTS; but few institutional limitations have negative effect to the satisfaction of the users they are No advertising system or no public awareness system about the EMTS, financial incapability of sub and branch post offices for payment, and indifferent attitude of EMTS service providers. In field survey majority respondent said that they have faith on EMTS service as it is government service, because of some institutional incapability users are losing their satisfaction on EMTS, so authority can take necessary initiative for the further improvement of EMTS service.

1. Authority can enhance the financial capability of all post offices for payment
2. Authority can introduce the proper incentive system for the service providers
3. Authority can also introduce the publicity system for public awareness.

The above measures would encourage satisfaction of the users.

In short, the study concludes that users satisfaction influence the performance of EMTS.

Table of Contents

Dedication	i
Abstract	ii
Table of Contents	iii
List of Tables & Charts	iv
List of Figures	vii
List of Abbreviations	viii
Acknowledgement	ix

Chapter 1	Introduction	1-14
	1.1	Background and Context
	1.2	Working Definition of the concept
	1.3	Statement of the Problem
	1.4	Justification of the Study
	1.5	Scope of the Study
	1.6	Significance of the Study
	1.7	Objective of the Research
	1.8	Research question
	1.9	Limitation of the Research
	1.10	Chapter Plan
Chapter 2	Literature Review, Theoretical Concept and Analytical Framework	15-28
	2.1	Review of Literature
	2.2	Lack of Local empirical literature
	2.3	Some Literature from Bangladesh
	2.4	Theoretical Discussion
	2.5	Theoretical Background
	2.6	Technology Acceptance Model (TAM)
	2.7	TAM : Perceived Ease of use and Perceived usefulness
	2.8	Analytical Frame work
	2.9	Definition of variables
	2.10	Hypothesis
	2..11	Conclusion

Chapter 3	Research Design and Methodology		29-38
	3.1	Introduction	29
	3.2	Research Design	29
	3.3	Research Method	30
	3.4	Study Population and Sampling	30-31
	3.5	Research Location	31
	3.6	The Reason for choosing Research areas	32-33
	3.7	Sources of Data	33
	3.8	Primary Data Collection Techniques	34-35
	3.9	Qualitative Data Collection	35-36
	3.10	Content Analysis	36
	3.11	Validation of Data	36
	3.12	Data Analysis	36
	3.13	Limitations & Challenges of Data Collection	36-37
	3.14	Chapter Conclusion	38
Chapter 4	A Brief Account of Bangladesh Post office-Electronic Money Transfer Service		39-42
	4.1	Background	39
	4.2	Area Coverage	39
	4.3	EMTS Tools/Devices	40
	4.4	EMTS Software	40
	4.5	Procedure	40
	4.6	Main Features of Bangladesh Post Office-Electronic Money Transfer Service	41
	4.9	EMTS procedure system	42-43
	4.10	Conclusion	44
Chapter 5	Data presentation and Analysis		45-67
	5.1	Introduction	45
	5.2	Study Area	45-46
	5.3	Socio-economic and demographical characteristics of respondents	46-47

	5.4	Frequency of EMTS service user	47-48
	5.5	Satisfaction Level of EMTS user's:	48-49
	5.6	Distance	50-51
	5.7	Transport Cost to avail the EMTS service	51-52
	5.8	Waiting time for the service	53-54
	Case-1	Person very satisfied with the service	54
	5.9.	Easy accessibility of EMTS service	55-56
	Case-2	Person not satisfied with the attitude of service provider	56-57
	5.10	Attitude of service provider	58-57
	5.11	Financial capability of Post office for Payment	58-60
	Case-3	Person with extreme dissatisfaction from EMTS Service	61
	5.12	Completion of EMTS transaction task with in a service hour	61-62
	5.13	User's awareness about the service	62
	5.14	Publicity for EMTS by Post Office	62-63
	5.15	Security of EMTS	63-64
	5.16	EMTS service is a quick service	65-66
	5.17	Conclusion	66-67
Chapter 6	Discussion and Summary		68-74
	6.1	Discussion	71
	6.2	General Findings	69
	6.3	Factors Causing satisfaction of the users	71
	6.4	Summary	72-76
Chapter 7	Conclusion and Recommendations		77-78
	7.1	Introduction	77
	7.2	Conclusion	77
	7.3	Recommendations	78-79
	7.4	Policy Implications	79-80
	7.5	Recommendations for further Studies	80-81
References			82-86
Annex I			87-89

Annex II	90-92
Annex III	93-94
Annex IV	95-96
Annex V	96-101
Annex VI	101-104
Annex VII	104

List of Tables & Charts

Name of the Table & Charts	Page No.
Table 1.1: Charge of EMTS	9
Table 2.10: List of Variables and Indicators	27
Table-3.4: Methods and sample size	30
Table 3.9: Sample Size of Service Provider	36
Table 4.10: Commissions for Electronic Money Order (BDT)	44
Table 5.1: Study area and distribution of respondents	46
Cross table 5.2: Study area and Satisfaction from EMTS service	46
Table 5.3: Socio- economic and demographic characteristics of respondents	47
Table 5.9: Frequency' of use of EMTS services	48
Chart 5.1: Satisfaction level of EMTS user's	48
Chart 5.2: Distance	50
Cross table 5.10: Distance and Satisfied from EMTS service	51
Chart 5.3: Transport cost for EMTS service	52
Cross table 5.11: Transport cost and Satisfaction from EMTS	52
Chart 5.4: Waiting time for the service	53
Cross-table 5.12: Waiting time and Satisfied from EMTS service	54
Chart 5.5: Easy accessibility of EMTS service	55
Cross table 5.13: Easy accessibility and satisfied from EMTS service	55
Chart 5.6: Attitude of service Provider	57
Cross table 5.14: Attitude of the service provider and satisfied from EMTS service	58
Chart 5.7: Financial Capability of post office for payment	59

Table 5.15: Financial Capacity of post office and Satisfied from EMTS service	60
Table 5.16: Completion of EMTS transaction task with in a service hour	61
Table 5.17: Source of information about EMTS	62
Table 5.18: Publicity for EMTS by Post Office	63
Chart 5.8: Security of EMTS	64
Cross table 5.19: Security and Satisfaction from EMTS service	64
Table 5.20: EMTS service is a quick service	65
Cross table 5.21: Quick service delivery and Satisfaction from EMTS service	66
Table: 5.22 Test of Hypothesis at a glance	67
Table 2: Data Collection Schedule, Sample and technique	96
Table 3&4: Sources of Data Collection	97-98
Cross table 5.3: Socio- economic and demographic characteristics of respondents annex	99
Table 5.23: Users of EMTS	100
Table 5.24: Revenue income of post office by EMTS	100
Table 5.25: Reason of preferring EMTS than other private operator	101
Table 5.26: Recommendations	101
Table 6.1 Chi-Square Tests: Study area	101
Table 6.2 Chi-Square Tests: Socio-economic and demographic characteristics of respondents	101- 102
Chi-Square Tests Table 6.6: Easily accessible and Satisfaction EMTS service	103
Chi-square test table 6.7: Attitude of the service provider and Satisfaction	103
Chi-Square Test Table 6.8: Financial Capacity of post office and Satisfaction	103
Chi-Square Tests Table 6.10: quick service and Satisfaction	104

List of Figure

<u>Name of the Figure</u>	Page No.
Figure 2.9: Analytical Framework	25
Figure 4.1: EMO FORM-1 for issue or transfer	42
Figure 4.2: EMO FORM-2 for disburse of payment	42
Figure 4.3: EMTS procedure system	43

LIST OF ABBREVIATIONS

ATM	Automatic Teller Machine
BD	Bangladesh
BPO	Bangladesh Post Office
BSNL	Bharat Sanchar Nigam Limited
BTRC	Bangladesh Telecommunication Regulatory Commission
DG	Director General
DOP	Department of Post office
DPMG	Deputy Post Master General
E- transactions	Electronic Transaction
EMTS	Electronic Money Transfer System
GoB	Government of Bangladesh
Govt.	Government
GPO	General Post Office
GSMA	Group Special Mobile Association
HPO	Head Post Office
ICT	Information Communication and Technology
IT	Information Technology
IS	Information System
MMT	Mobile Money Transfer
MOPTI	Ministry of Post, Telecommunication and Information Technology
M-Pesa	M-stands for mobile and Pesa for money
MPS	Mobile Payment System
PIN	Personal Identification Number
PO	Post Office
P2P	Person-to-Person
SMS	Simple Message Service
SPSS	Statistical Packages for the Social Sciences
SPO	Sub Post office
TAM	Technology Acceptance Model
Tk.	Taka

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Chapter One: Introduction

1.1 Background and context

For centuries, postal services around the world were the most popular mode of communications between people across space for both personal and official purposes. But with the advances in communications technologies and emergence of private courier services, people's reliance on the traditional postal service has significantly declined. Now the postal service in any country is surviving only by introducing new services with the help of ICT. The use of ICT by organizations and enterprises in improving work processes is one of the most important opportunities for the application of ICT (Gatautis, 2008). The mobile phone and computer has been a key ICT product that has affected business practices. Transfer of money from one location to another with the use of devices like computer web or mobile phone has become more popular over the world. Electronic money transfer system of Bangladesh post office is one of the new innovations of digital services. Money transfer system of Bangladesh post office has gone through many changes, the most important things is the introduction of Information and Communication Technology (ICT). Post office's money order service enables citizens to transfer money. This payment service has played an important role especially in rural areas where bank branches are not available. Many urban workers come from rural areas to look for a job and want to send their salaries to family members living in their home towns. Majority of these rural residents do not have any bank account due to difficulty to access bank branches (Islam; 2012). Hence, money order becomes a popular and important remittance method for rural communities. There are two types money transfer system in Bangladesh post office:

- 1) Traditional money transfer system of BPO which is paper base and
- 2) New money transfer system of BPO is EMTS which is mobile or web base.

Traditional money transfer system of Bangladesh post office:

In order to send money using the ordinary paper base money order, (1) a customer visits a post office and fills out a money order form requiring information about sender, receiver, and amount of money; (2) a operator receives money and send the money order form to the designated post office by mail, which takes 2-7 days to reach; (3) the cash post office

passes the form over to a disburse post office; and (4) a postman in the disburse post office delivers the money to the recipient (Islam, 2012, pp. 9-10). This remittance, although popular in rural communities, has suffered from two chronic problems. First, it takes a long time to complete transaction largely due to time spent for money order form to reach the cash post office. Second, ordinary money order does not have a systematic way to keep records and monitor transactions. Some employees were punished for withdrawing money with fake money order they issued and misappropriating money to be delivered to recipients (cited in ibid). In some cases, a money order was paid more than once. In order to figure out these problems and also to fulfill the potent demand of user's for quick transfer of money at desired locations where beneficiaries can collect and use it instantly. With this perspective, the Bangladesh Post launched a new money order service named Electronic Money Transfer Service (EMTS).

EMTS of Bangladesh post office

EMTS is newly innovated money transfer system of Bangladesh post office. It is the replacement of paper based traditional money order to satisfy the urgent need of the customer as well as creating quick and regular flow of money through a trusted legalized channel. Electronic money transfer typically refers to services where by customers can use mobile phone devices to send and receive money. And it is now only for domestic transfer. The key characteristic of EMTS service is that it relate to private transactions only. EMTS addresses person-to-person (P2P) money transfers system. For EMTS it requires mobile phone or computer web, sender gives the money to EMTS operator at post office and pays a fee for remittance. The operator then transfers the money electronically through the mobile phone or internet to the recipient post office. This is a general description of Electronic money transfers system. Post office can use internet or mobile phone for the service. But most of the time, post office uses mobile phone for the EMTS service as because operators does not feel comfort with the internet and post office also suffer for continuous supply of electricity. Electricity is a major problem in Bangladesh, especially in rural areas. On the other hand, mobile phone does not need continuous supply of electricity and can easily be charged by battery or solar charger.

Moreover, the total number of Mobile Phone subscriptions in Bangladesh has reached in 121.860 million at the end of January 2015 and each and every house hold has more than one mobile phone. (<http://www.btrc.gov.bd/content/mobile-phone-subscribers->

[bangladesh-january-2015](#) accessed: 18.10.2015). Due to the widespread use of mobile technologies in almost all aspects of life and easy availability of it, almost every post office using mobile phone for EMTS service. EMTS is a mobile-- short message service-- and Web based remittance system that enables mobile phone users to send money (electronic money order) up to BDT 50,000 at post offices without relying on formal banking systems. This mobile payment system was developed by the public-private partnership of Bangladesh Post Office, software consultants, and a private mobile phone operator Banglalink. EMTS was inaugurated by the Honorable Prime Minister of Bangladesh on March 26, 2010 A.D. This service was commercially launched in a limited area (in 104 post offices) on May 01, 2010 A.D. (Source: [www.ministry of post, telecommunication and information technology.govt.bd](#), web page accessed 28.01.2015). And this mode of money transfer system is easier to the users than the earlier form of cash delivery system of post offices. Now it is relatively affordable, anyone can use EMTS service from any post office where EMTS is available. According to Jenkins, (2008) "Mobile money" is money that can be accessed and used via mobile phone. Mobile money can be used to settle a variety of transactions conveniently and it transforms the mobile phone into a mobile wallet.

ICT and EMTS at Bangladesh post office

In today's world, optimum use of ICT is vital for a country's socio-economic development. It is generally accepted that the easy access to information increases productivity; ensures fair, neutral and competitive market system in government and non-government levels. Besides, technology helps bring information and deliver services at the people's doorsteps. Considering these conveniences of ICT the incumbent government is firmly determined to build a 'Digital Bangladesh' and has also taken various initiatives in this regard. According to the National ICT Policy-2009, 306 short-term, mid-term and long-term plans have been identified for the realization of Vision 2021. Digital Bangladesh is an issue regarding which there is no conflict or difference of opinion between the government and the people—all are working hand-in-hand for its realization (http://www.lcgbangladesh.org/bdf-2010/BG_%2520Paper/BDF2010_Session%2520VI.pdf accessed: 20.08.2015). In tune with the postal players around the world, there have been rapid modernizations in Bangladesh Post, which are the new innovations of ICT. To develop ICT based digital, quick and secured Money Transfer, Bangladesh post has taken a range of initiatives in the

last five years, EMTS is one of the best example. The traditional paper based money order system has gone through various changes due to the introduction of Information Communication and Technology (ICT). Before the ICT revolution; it used to be a time consuming, expensive and inefficient process for remit money to different parts of the country. In Consistence with fulfilling the government's dream of a 'Digital Bangladesh', Bangladesh post has introduced this Electronic money transfer system (EMTS) in 2010 which has affected the traditional money order system of Bangladesh post office. Electronic money transfer system through mobile phone offers speedier, quicker and dependable services to its user. At present, Bangladesh Post is rendering EMTS Service to 16% of total rural people with its 2750 post offices. (Source: www.Ministry of post.telecommunication and information technology.govt.bd, Oweb page accessed: 28.01.2015). Use of mobile and internet has given birth of a new revolution in Bangladesh post office; where money transfer has been simplified and it is reaching to the wider portion of mobile phone users. The users also include the less privileged who had earlier no access to actual bank accounts in the formal banks (Dovi, 2008). Consumers are attracted to these technologies because of convenience, increasing ease of use and in some instances for cost savings (Anguelov et al; 2004 as cited sohel et al; 2011). According to Okiro & Ndungu; (2012) Technology has greatly advanced playing a major role in improving the standards of service delivery in the financial institution sector.

EMTS wins prestigious mBillionth Award and National Digital Innovation Award 2011:

M billionth award 2011:

Electronic Money Transfer Service (EMTS) won the prestigious mBillionth Award South Asia 2011, for using its own software and transfer money through mobile phone. Bangladesh Post Office and private consultants jointly built the software. Apart from winning the award under m-business and commerce/banking category, the EMTS service was also marked as the most innovative digital service in the entire South Asia in the mBillionth International Mobile and Telecom Congress and Award Gala in New Delhi on 23rd July 2011. South Asian countries like Bangladesh, Bhutan, Sri Lanka, Maldives, Nepal, Pakistan, and Afghanistan were present in 2011 International Summit and host country was India. (Source: <http://dig.do/bangladeshpost.gov.bd> accessed: 20.10.2015).

The mBillionth is a platform for knowledge sharing in different domains of mobile technology and facilitates multi-stakeholder partnerships and networking among governments, industry, academia and civil society organizations of South Asian countries.

National Digital Innovation Award 2011:

The EMTS received country's highest award related to digital intervention the Digital Innovation Award 2011 under e- finance category during Digital Innovation fair- 2011. (Source: <http://dig.do/bangladeshpost.govt.bd> accessed 20.10.2015).

The ultimate objective of EMTS is to make postal money transfer service more available at the doorsteps of the people with increased digitalization where possible. This research has been undertaken mainly to find out the Performance of EMTS service from the user's satisfaction view point. Researcher applies here the Technology Acceptance Model (TAM) of Davis (1989). To get better understanding about the Performance of the EMTS, it is require to examine its user's behavioral intention to use the service; whether Electronic Money Transfer System (EMTS) of Bangladesh post office 'can satisfy the customers or not. And it is the prime concern of this study

1.2 Working Definitions of the concept:

EMTS:

EMTS means Electronic Money Transfer System. Here Electronic refers cell phone, mobile phone or internet. To send money through, mobile phone or internet, is a form of electronic money. Here use of mobile phones or internet is to conduct financial transactions only such as sending and receiving money from post office to post office. For total connectivity of the service, BPO has signed an agreement with Banglalink a leading mobile phone company in the country. This is popularly known as a mobile money order service or EMTS. It is just replacement of paper base money order service of BPO.

Performance of EMTS:

Here performance of EMTS is measured from the "user's satisfaction" view point. And performance refers to the **efficiency and effectiveness** of the EMTS service. Meaning that how effective and efficient EMTS service is to the users. **Efficiency** refers to how well EMTS service is going on; **Effectiveness** refers to how post office is delivering EMTS service to its users. How useful EMTS is. Is EMTS able to meet user's requirements? Or are users satisfied with EMTS.

User's satisfaction:

Satisfaction can be reflected as a feeling of pleasure when a person attains his or her wants, goals or motivation (Boonlertvanich, 2011). User's satisfaction can be defined as a feeling of user's by using a service or product (Metawa and Almossawi, 1998). User's satisfaction is key factor of user's desires for future purchase (Mittal & Kamakura, 2001). Besides, the satisfied users will probably share their good experiences with others (Jamal & Naser, 2002). Bangladesh post office is providing such new innovative technique of quick money transfer service EMTS to satisfy users. So in order to increase the efficiency of the EMTS it is necessary to measure the user's satisfaction. According to Khattak and Rehman (2010), one of essential factor of the strategy of any organization is the customer's satisfactions because customers are the ultimate source of company's revenue. So customer satisfaction is important for attracting the new customers and retaining the old ones (cited in Ibid). So, it is significant to evaluate User's satisfaction of EMTS service of Bangladesh post office.' is EMTS able to satisfy its user's.

Government Post office- was used to refer post offices which are established and run by the Government of Bangladesh (GoB) to deliver postal related services among the postal service users.

Post office and EMTS

Bangladesh Post provides the monetary solution named Electronic Money Transfer Service (EMTS) for those want to send money instantly anywhere within the national territory. Most commercial banks are doing the same, but they do not have many branches and not so widely distributed, So, Post Office is the best choice for millions to avail the instant money remittance service. EMTS will help solve problems such as carrying large sums of money around for making payments.

Users of EMTS service:

The current users of this service are businessmen, migrant workers, students and some companies. The migrant workers in urban areas keeping their families in the countryside are using this service to remit money to their families. Students of different universities/ colleges are getting their monthly expenses from their guardians through this service. Students are paying their admission fees and other dues using this service. Salary

disbursement of company employees working in different regions of the country are currently made by EMTS.

Aims of EMTS:

EMTS is running by Bangladesh post office. Bangladesh Post will expand this service to its all ten thousand locations gradually. Citizens anywhere in the country can avail this service from their convenient locations. Bangladesh Post will work as the cash points of some of the commercial Banks in remote locations not having branches in those areas. People can even deposit their Insurance premiums through this service. In near future people will not require to come to post office location for transacting money. Even living in their home they can request sending or transferring money to some ones mobile phone/post office account, bank account or pay bills from their own account using computer or mobile phone. Students will be able to pay their tuition fees and other dues using this service. This will create lot of options for EMTS in future: (Source: Bangladesh postal Directorate, EMTS section aims and objective of EMTS dated 10.09.2015)

Features of EMTS:

1. Remittance in a minute
2. User Friendly- adoption of mobile phones & applications
3. Maximum Area coverage: Locations distributed throughout the country (presently 2750 POs), to be expanded to all Post Office locations
4. Transaction security ensured by a 16 digit auto PIN generation mechanism
5. Independent of Mobile Operator-customer enjoying mobile operator's service can use this service.
6. EMTS devices not specific to power sources like electricity -have freedom of using any Source of Power (electricity, battery, solar charger)

Ensure customer satisfaction- Daylong well acquainted Help Desk Service. (Bangladesh postal Directorate EMTS section, aims and objective of EMTS dated 10.09.2015)

7.

8. Optional Corporate Services:

- a) One 2 Many transactions-Option for Salary Disbursement
 - b) Many 2 One Transactions- Option for collection of tuition/Admission fees from students
9. Location Independent Disbursement

10. Widely used Network Partner- Banglalink Mobile Operator
11. Database Management and Security-VPN /virtual private network Connectivity
12. Scope to add new value added service and future expansion.

(Source: Bangladesh postal Directorate EMTS section, aims and objective of EMTS dated 10.09.2015)

Why EMTS is unique:

This Service is safe and speedy because a VPN channel/“virtual private network” channel is maintaining its security. People are getting this service, from maximum locations in the country as compared to other remittance channels. The service points are familiar to people and they feel comfortable to obtain service from these points. It's a total solution for people to send or receive money. Every month some more hundreds of locations are being brought under this service (Source: Bangladesh Postal Directorate EMTS section, aims and objective of EMTS dated 10.09.2015).

Bangladesh Post Office (BPO) with Banglalink:

Bangladesh Post Office (BPO) introduced the Electronic Money Transfer System (EMTS) with Banglalink in order to make money order payment easier and faster. For this, Bangladesh post office has signed an agreement with Banglalink, a leading mobile phone company in the country, for total connectivity of the service in the year 2010. By this money transfer system anyone can send money to his desire location within two or three minutes while manually in the old system it takes at least three to 5 days and even seven days. For this money transfer system, the post offices will charge Tk.20 for the first Tk.1, 000 and Tk.10 for each of the next Tk. 1,000. Besides, Tk. 7.0 will be charged as electronic cost for the Banglalink. Anyone can send money up to 50,000 Tk. at a time by this Service (www.mopti.govt.bd accessed: 29.01.2015).

Charge for EMTS:

Charge is applicable only for sending time. For EMTS service Banglalink charge is fixing 7.00 taka for per issue. Banglalink gets this 7.00taka only for SMS delivery to the sender and EMTS operators. The following charge is imposing for EMTS.

Table: 1.1 Charges for EMTS

Taka	Time	Post office	Banglalink	Total for PO	Total for Banglalink	Total charge for both
For issuing 3000 Taka	for 1 st 1000	20 taka	07 taka	40	07	47 taka (for 3000 Taka)
	for 2 nd 1000	10taka				
	for 3 rd 1000	10 taka				

(Source: Bangladesh Postal Directorate EMTS section dated 03.09.2015)

If anyone sent 3000 taka at a time by EMTS service the total service charge will be 47 taka. Post office will get 40 taka and Banglalink will get 7.00 taka for sending message as a service charge.

On the other hand, there is various a private sector providers for the same service i.e.

Sl.	Service name	Operator
1	bkash	BRAC Bank
2	DBBL	Dutch Bangla Bank Mobile Banking
3	mCash	Islami Bank Bangladesh Limited
4	MYCash	Mercantile Bank
5	uCash	United Commercial Bank
6	EMTS	Bangladesh Post Office

(<https://www.upside.com/2015/03/31/access-mobile-banking-changes-lives-bangladesh/> accessed: 20.10.2015)

Among all the Private sector providers; bkash and DBBL mobile banking are more popular. bkash Limited with BRAC Bank the ultimate objective of bkash is to ensure access to a broader range of financial services for the people of Bangladesh. It has a special focus to serve the low income masses of the country to achieve broader financial inclusion by providing services that are convenient, affordable and reliable(www.bkash.bd.com accessed: 16.07.2015).

Electronic money transfer rates of different service providers: According to mopit.govt.bd accessed: 28.01.2015

Electronic money Transfer fees of different Service Organization for per 1,000 Taka's.

Sl.	Service name	Operator	Rate (Tk.)
1	bkash	BRAC Bank	23.50
2	DBBL	Dutch Bangla Bank Mobile Banking	30
3	mCash	Islami Bank Bangladesh Limited	19
4	MYCash	Mercantile Bank	20
5	uCash	United Commercial Bank	23.50
6	EMTS	Bangladesh Post Office	27 (now); 15 (proposed)

1.3 Statement of the Problem

Since 2010, when the mobile money transfers system EMTS was launched in Bangladesh post office with banglalink mobile operator, the mobile payment has become popular with both the banked and the unbanked population and this service expanded swiftly across the country until 2015 due to its easy, quick procedure and lower service charges. EMTS of the Bangladesh Post Office reported a dramatic increase in 2011 in the number of electronic money orders issued and amount of money transferred through the system. Commission earning from money order business has increased and became BPO's major source of earning in 2011 (as cited Park and Islam 2013). Around 3.3 million transactions were made through the service in 2011, and the number almost tripled in 2012 (Ibid).

However, the once popular EMTS service of the BPO is gradually losing its market share for the last couple of years. EMTS faced a serious setback in the year 2013, as the number of transactions dropped by nearly 65 percent in the year after arrival of a number of private operators in the market. (www.mopti.govt.bd accessed: 01.03.2015). According to BPO data 2014, earnings from EMTS also declined drastically to nearly Tk 171 million during January-December period of 2013 against Tk 361 million a year ago. During January-April period of 2014 transaction of EMTS of BPO dropped to Tk 3.14 billion against Tk 6.49 billion in the corresponding period (Ibid). The money transfer service is losing its market share dramatically due to rapid expansion of various mobile money transfer services by the private commercial banks and other operators and certain number of institutional factors. So, in depth study is required to identify the institutional factors that are responsible for EMTS performance.

Application of the mobile phones for money transfer has marked a new frontier in mobile phone technology. Mobile Payment System (MPS) is an innovative application on the mobile phone platform that allows a person to initiate a transaction and make a payment using a mobile phone; and it allows commercial transactions to be carried out anytime anywhere and by anyone. (as cited Kofigah, 2010). A fundamental assumption of most recent research in operations improvement and operations learning has been that technological innovation has a direct bearing on performance improvement (Upton and Kim, 1999 as cited Okiro and Ndungu, 2013). This study attempts to investigate the factors responsible for EMTS performance. From this point of view researcher trying to explore the Performance of Electronic Money Transfer System of Bangladesh post

office from the user's satisfaction view point. EMTS performance is directly dependent on efficiency and effectiveness of the service, Whether EMTS is capable to make satisfy its user's or not.

1.4 Justification of the Study

The public service in Bangladesh is mostly criticized for its poor, inefficient service delivery. Post office is one of the frontline offices for postal related service delivery. These offices are responsible for delivering postal services even at the grass root level. It is common saying that in governmental postal services there is much public suffering, delay in getting service, ill-management and poor service delivery etc. EMTS is one of governmental postal service of Bangladesh. To dig out the performance of EMTS three post offices has been selected purposively. But there has not been much study on EMTS service to identify the problems and reveal the ground realities of the service. So it is justified to explore user's satisfaction with the service, to evaluate the performance of EMTS.

1.5. Scope of the Study:

Though almost five years have passed after introducing this EMTS service by Bangladesh post office, the government has not undertaken any research to assess the performance of this service, or to assess satisfaction of user's with the service, whether EMTS is being able to fulfill its aims or not. In 2010, Government of Bangladesh has launched this service under project; Among 9,886 post offices presently 2750 post offices providing the EMTS services. (www.mopti.govt.bd accessed: 01.03.2015). But, no systematic effort has been carried away to assess the performance of this service. Some non-government organizations and some private individuals in recent years have conducted some researches on the mobile banking system that show that the performance of the postal Electronic Money Transfer System service is very poor and unsatisfactory. Most of the researches were sponsored by bank or private courier company that were inclined/ biased to their own form of arbitration methods. Because of time constraint this research was conducted on three post offices like Dhaka university post office, Moulvibazar head post office and Tangail head post office; it may carry a good outcome. So, a wider scope exists for research work to know the performance of Electronic money transfer system of Bangladesh post office. As Bangladesh, a country of third world, Service Providers of the EMTS faces many challenges which may influence the service performance. For this

reason, in-depth study is required to dig out the performance of governmental Electronic Money Transfer System.

1.4 Significance of the Study:

The significances of the research are as follows:

Electronic money Transfer system is a new phenomenon of Bangladesh post office, and there has been scanty attempt to explore the factors that are responsible for EMTS performance. Thus, it would be interesting to investigate the association between the variables under study.

1. It is important to explore satisfaction of the user's, what users are thinking about the service and the nature of the service, and utility of the service.
2. The results of this study will present valuable information about postal electronic money transfer system so that government could take any necessary action for the future development of the service.
3. It will also be useful to academicians and future researchers.

1.5 Objectives of this Research Proposal:

The purpose of this research proposal is to explore the performance of the Electronic Money Transfer System of Bangladesh post office.

Objectives:

1. To explore the performance of EMTS

1.8 Research question:

In view of the broader objective of this study, the study generates following research questions:

1. What is the present condition of EMTS service?
2. What factors are responsible for EMTS performance?

1.9. Limitations of research:

In conducting this study, the researcher expects to face the following limitations that may affect the effectiveness of the study. Some limitations of which are

- a). The research is limited only to explore EMTS performance and it does not explore the performance of other private providers.

b). the performance of Postal EMTS service is looked from only one angle i.e., satisfaction of user's with the service not with the other's factors of the service.

c). another limitation is, the study has been done only on one service of Bangladesh post office i.e., only EMTS service, and it did not attempt to learn the other's services of post office or private provider's.

d)Time constraint

This study was carried out for a short period to follow the deadline of the academic calendar. For data collection researcher got only one month. This Time constraint may affect both, the quality and quantity of the study.

e) Limited study Area and respondents:

The study was limited on three post offices. Area was Dhaka university post office, Tangail and Moulvibazar head post office also in postal Directorate. Only 60 respondents were chosen purposively. For questionnaire survey sample size was 60 respondents, 03 in dept interview for service implementers. And 03 cases also included. If more areas were covered with more respondents the findings could be more valuable.

f) Lack of local empirical literature

Local empirical literature on performance of postal Electronic money transfer system is very lacking, In Bangladesh not much works have been done on the Electronic Money Transfer System (EMTS) as a result, and the researcher will have to rely mostly on literature from developed countries. This may not give a true picture because challenges in one country may differ from challenges in another country.

- On the other hand electronic money transfer system is a very new concept of Bangladesh post office. Besides this, the employees and customers are not so much familiar with this. These may create difficulties in getting true picture of existing operation of Electronic Money Transfer System of Bangladesh post office

1.10 Chapter Plan The methodology The methodology

The research study has been organized into seven chapters and each chapter is further divided into various subsections. The first chapter introduces the study. The second chapter reviews different literatures and theoretical framework for the study. The chapter also presents the hypotheses that are to be tested and the procedure adopted to analyze data and test hypotheses. Chapter three presents the methodology, which provides information regarding the types and sources of data used in the study. The fourth chapter

provides brief outline about Electronic money transfer service (EMTS) of Bangladesh post office, Chapter five presents' data analysis and findings .Then the sixth chapter presents discussion and summary. Finally, the last chapter concludes the whole thesis and recommendation to improve the EMTS service and further studies.

Chapter Two: Literature Review, Theoretical Concept and Analytical Framework.

2.1 Review of literature:

In Kenya, money transfer services were offered by entities that fall in three categories: formal providers (that include commercial banks and the Kenya Postal Corporation (POSTA), by semi-formal providers (like, courier and bus companies), and by informal services or means (for instance, by bus conductors and friends) (Kabucho, Sander and Mukwana, 2003 as cited Wanyonyi 2013). So, Money Transfer Services transferred money or funds from one location to another with the help of several methods; among all methods Mobile money transfer service has becoming popular all over the world day by day. Mukwana and Sander, (2003), noted that these methods are quick, dependable, and easy to process; with which money can be sent or received all over the world without any hassles.

According to Wambari & Mwaura (2009); Mobile money transfer services can also be viewed as a variation of branchless banking with the potential for delivery of financial services outside conventional banking.

Mobile money transfer system all over the world:

In general, mobile money transfer is a term describing the services that allow electronic money transactions over a mobile phone. It is also referred *transformational* service that uses information and communication technologies (ICTs) and non-bank retail channels to extend the delivery of financial services to clients who cannot be reached profitably with traditional branch-based financial services(source;www.gsma.com/**mobile** for development accessed: 23.10.2015).

Typical examples of mobile money services are e-wallets that are used to make peer-to-peer (P2P)transfers and a range of payments or use of a mobile phone to send money to family or friends, or also to receive salary and government to person payments (G2P) (cited in Ibid). The key characteristics of a mobile money transfer services are:

- Customers get money into and out of the service using a network of transactional agents that operate outside bank branches; and

- Customers initiate transactions using an interface that is available on basic mobile handsets (source; [www.gsma.com/mobile for development](http://www.gsma.com/mobile%20for%20development) accessed 23.10.2015).

Globally, more than 2.5 billion adults do not have a formal bank account, most of them in developing Economies. Only 41 per cent of adults in the developing countries have a formal bank account. A growing number of people in remote areas are using new alternatives to traditional banking made possible by the rapid spread of mobile phones, as mobile penetration is expected to reach 100 per cent worldwide by 2015. In most cases, mobile money is a substitute both for paper-based banks and for sending cash by informal methods through a third party. It enables people who cannot get to a bank branch or ATM to use financial services. (Source; www.itu.int/.../T230100002000 accessed 21.10.2015).

Some institutions such as the World Bank, GSMA the Melinda and Bill Gates Foundation have initiated funding for mobile money programmes, for the unbanked cited in Financial Inclusion part-2; (2013). According to the GSMA's annual report, *Mobile Money for the Unbanked 2012*, there were 140 live mobile money transfer systems in place in low- and middle-income countries targeting the unbanked in 2012. Remittances and remote payments are the most common uses of mobile money in developing countries (source: www.itu.int/.../T230100002000 accessed 21.10.2015). According to the [Global Mobile Systems Association](#) (GMSA) report 2015, in the [first quarter of 2015](#), there were over 900 million mobile subscribers in Africa, and 3.7 billion in [Asia](#). Approximately 255 mobile money transfer services were operating across 89 countries in 2014. They are now accessible in more than 60 percent of developing markets. Sub Saharan Africa is the region where mobile money is most widely spread, followed by Southeast Asia and Latin America, and developing markets will continue to drive growth in mobile subscriptions for the foreseeable future. (Source: www.gsmamobileeconomy.com/GSMA_Global_Mobile_Economy_Report_2015.pdf 25.10.2015).

Some successful implementations of mobile money transfer services are discussed below, such as M-PESA, Easy-paisa, GCASH, Bkash, DOP and EMTS etc.

M-PESA

In Kenya the vision 2030 proposes intensified application of science, technology and innovation to raise productivity and efficiency across its three pillars (economic, social

and political) on which it is based. Mobile Money Transfer Service (MMTS) is one of the innovations in the ICT sector that may enhance the efficiency of businesses if properly used. (Cited in Wanyonyi, 2013). M-PESA (“Mobile-Cash”) that is the most successful mobile financial service is known to be Kenya’s is a joint product of the public-private partnership. The U.K Department for International Development provided the Financial Deepening Challenge Fund (FDCF); in 2007, Safaricom and Vodafone launched this mobile money transfer service M-PESA. Vodafone Group develops, hosts, and owns the M-PESA system; local mobile operator Safaricom runs the M-PESA; and central and commercial banks contribute to float balancing or liquidity management (Hughes & Lonie, 2007; Jact et al., 2010; Mas & Ng’weno, 2010 as cited Park and Islam; 2013). This SMS-based mobile banking and payment system enables individuals not only to deposit, withdraw, and send money using their mobile handsets, but also to pay for goods and services as well (Hughes & Lonie, 2007, p. 78 cited in Ibid). Following the launch of mobile money transfer service M-Pesa by Safaricom, a Mobile Network Operator in Kenya, in March 2007, there was quick adoption of the service by many Kenyans through subscription to M-Pesa. The growth of M-Pesa users has been rapid over the years, within eight months of its launch, M-pesa had 900, 000 subscribers (Omwansa, 2009) and by September 2009, over 8.5 million Kenyans were registered users (Safaricom, 2009). Five years later M-PESA provides services to 15 million Kenyans (more than a third of the country’s population) and serves as a conduit for a fifth of the country's GDP. M-PESA is expanding quickly and has cemented its presence in Kenya, as well as expanded to Tanzania, South Africa, Afghanistan, India and its latest addition Romania in March 2014.([http //www.itu.int/.../T230100002000](http://www.itu.int/.../T230100002000) accessed 21.10.2015).

Easy paisa

In Pakistan, 89 per cent of the adult population does not have a bank account. Easy paisa was established in 2009 in Pakistan through a partnership between Telenor Pakistan and Tameer Microfinance Bank. The partnership has developed a network of over 20, 000 agents. The main differentiating factor in Easy paisa is that customers do not require a mobile phone or account with Telenor to pay their bills or to send/receive money. These transactions are done at any of the 20 000 Easy paisa shops around the country by the merchant on his mobile phone. In 2010, Easy paisa mobile accounts (m-wallets) were launched for Telenor SIM subscribers only. Mobile Account subscribers use their own phones for all transactions and only need to go to Easy paisa shops in Pakistan to deposit or withdraw cash from their Easy paisa mobile account. Services offered include bill payments, money transfers, airtime purchase, savings and insurance, retail purchase, corporate solutions, viewing account balances and recent transactions, managing PIN

codes, and so on. In 2012, Easy paisa conducted on average over 5 million transactions every month. (Source:<http://telenor.com/corporate-responsibility/initiatives-worldwide/easypaisa-banking-services-made-easy>)

GCASH

GCASH is a mobile money transfer service from Globe Telecom in the Philippines, which transforms a mobile phone into a virtual wallet for secure, fast, and convenient money transfers at the speed and cost of a text message. The recipient in the Philippines can easily receive a sender's remittance direct to his mobile phone. Globe Telecom issues an account which is the GCASH account in which the money is sent by the sender to be withdrawn by the recipient. The recipient is sent an SMS alert indicating the amount sent to his or her GCASH account. Source: www.itu.int/.../T230100002000 accessed: 21.10.2015 ITU-T Technology Watch. The Mobile Money Revolution–Part 2: Financial Inclusion Enabler (May 2013)

DOP

DOP is a mobile money transfer service of Indian post office with BSNL (Bharat Sanchar Nigam Limited is an Indian [state-owned telecommunications](#) company). The consumer just needs to have a mobile while the actual transmission of the money is initiated by the Postal Assistant, using his/her special handset. The process for money transfer is very simple to understand and follow. The remitter (sender) can submit money (Cash In) at any of the covered post office and automatically, the amount is transferred to a central position, which can be collected by recipient customer (Cash Out) from any of the covered Post offices. As soon as the Cash in happens, both the sender and the recipient get a SMS on their mobile phones. The sender gets a Transaction ID and a Six (6) digit secret code in the SMS while the Recipient only gets the Transaction ID. Recipient can claim the money from any of the covered Post Offices by showing the Transaction ID that he receives on his mobile in the SMS and the Secret code, which he gets from the sender. In order to make process smooth and convenient, a notification SMS Is being sent to remitter as well as to recipient regarding transaction irrespective of their telecom operator. (Source: www.indiapost.gov.in/money_r... accessed 23.10.15).

Money transfer services In Bangladesh:

In Bangladesh money transfer services were also offered by three categories: formal providers (that include commercial banks and the Bangladesh Postal money order service), by semi-formal providers (like, courier, bKash Limited and bus companies, like SA Paribohan) and by informal services or means (for instance, by bus conductors and friends).

EMTS:

Bangladesh Post Office introduced the Electronic Money Transfer System (EMTS) with banglalink mobile company in 2010 to provide a mobile payment service to the “unbanked” citizens with heavy mobile use. The Electronic Money Transfer System

(EMTS) is a mobile-- short message service-- and Web based remittance support system that enables mobile phone users to send money (electronic money order) up to BDT 50,000 at post offices without relying on formal banking systems. At present besides Bangladesh post office, five banks are giving the mobile money transfer service using platform of mobile operators.

Sl.	Service name	Operator
1	bkash	BRAC Bank
2	DBBL	Dutch Bangla Bank Mobile Banking
3	mCash	Islami Bank Bangladesh Limited
4	MYCash	Mercantile Bank
5	uCash	United Commercial Bank
6	EMTS	Bangladesh Post Office

(<https://www.upsides.com/2015/03/31/access-mobile-banking-changes-lives-bangladesh/> accessed: 20.10.2015).

Among them Bkash with the BRAC Bank, and Dutch Bangla mobile Banking are popularly known for the service. In total 22 banks including Islami Bank Bangladesh Ltd and Mercantile Bank Ltd got the approval for the service (www.bb.gov.bd web page accessed:15.02.2015).

bkash

bkash Limited Launched in 2011 (incorporated as a subsidiary of BRAC Bank). It is a joint venture between BRAC Bank Limited, Bangladesh and US based company Money in Motion. bkash is a complete mobile financial service provider for common people which apart from sending and receiving money; Corporate solutions for salary payments, loan disbursements and collection of fees and loan installments are also available(Source; www.gsma.com/mobilefordevelopment accessed: 21.10.2015). Currently, bkash offers mobile financial services using the network of Grameen phone, Banglalink, Robi and Airtel and Teletalk. Up to February 2015, bkash has close to 110,000 registered agents across the country. bkash has achieved more than 16 million customer registrations'. (<https://www.upsides.com/2015/03/31/access-mobile-banking-changes-lives-/> accessed 20.10.2015) 'bkash platform has a holistic mobile financial service offering for its customers. In addition to Cash In, Cash Out and Person to Person (P2P) services, bkash customers can also use the International Remittances service, pay for goods via its Mobile Merchant Payments option, and buy Airtime for mobile phones. Customers can also benefit from earning interest on their wallet balances over a period of time. For businesses and organizations, wage disbursement facilities are available on the bkash

platform. bKash customers have a choice of 110,000 outlets across the country from which they can cash in and cash out at present. They can also use BRAC Bank ATMs to cash out. The cash-out fee ranks among the lowest in the world. (<https://www.upsides.com/2015/03/31/access-mobile-banking-changes-lives-bangladesh/> accessed: 20.10.2015).

Developing countries government's initiative with using m-money:

Developing countries governments are experimenting with using m-money on cell phones to pay public servants like police officers and teachers, with some surprising results (cited in Ishengoma; 2011). In Afghanistan 2010, when the government started paying police officers through M-Paisa, the Afghan version of the service, it discovered that 10% of the workforce was phantom employees, their paychecks being pocketed by corrupt managers (*source*: www.itu.int/.../T230100002000 accessed: 21.10.2015). In Pakistan, the Easy Paisa mobile banking platform there played a role in helping to distribute money to the unbanked rural poor in the aftermath of last summer's horrendous floods as a direct and efficient way to reach those most in need while minimizing the likelihood of leakage (cited *ibid*).

Similarity among all Mobile Money transfer services and EMTS of Bangladesh post office:

Like Kenya, Philippines, Pakistan and India, Bangladesh post office encountered the same circumstance. M-PESA, GCASH, Easy paisa, DOP, bKash and EMTS all are SMS based mobile money transfer system that are person-to-person remittance. To make mobile payment easy and do not require bank accounts and all the service are jointly product by of the public-private partnership. M-PESA and others are run by a commercial company in the market; only DOP of Indian post and EMTS of Bangladesh post office run by government under bureaucratic settings. As EMTS is run by the Bangladesh government. It will be interesting and valuable to examine the performance of public mobile money system of Bangladesh post office.

2.2 Lack of Local empirical literature:

Local empirical literature on Electronic Money transfer service is very lacking, as a result, the researcher will have to rely mostly on literature from developed countries. Several mobile payment trend studies have revealed the potential of mobile network technologies for payment purposes. (as cited Mbogo; 2010) (Pousettchi, 2003 cited in (*Ibid*); Taga and Karlson, 2004 cited in (*Ibid*); Speed facts online Research, 2001 cited in

(Ibid).But Most of these studies were conducted in developed countries and thus may not reflect the performance of EMTS of Bangladesh post offices. And this may not give a true picture because performance of Electronic Money transfer service may differ from one country to another country.

Mbogo; (2010) conducted a research, The Impact of Mobile Payments on the Success and Growth of Micro-Business: The Case of M-Pesa in Kenya. Mbogo tested different variables including accessibility of mobile payment services, transaction costs, convenience and security, perceived support from mobile payment operators, satisfaction with mobile payment services, and actual usage of mobile payment and business performance. The study results revealed positive correlation with the behavioral intention to use the mobile payment services and associated actual usage but low correlation between perceived support and actual usage. Micro business operators perceive that the use of the mobile payment services is advantageous to them with regard to its convenience, support, cost, satisfaction and safety. Personal Identification Number (PIN) is used to protect a subscriber account from abuse by other persons. They acknowledge continuous use of the mobile payment with adequate support from both government and service provider will positively impact their businesses.

2.3 Some Literature from Bangladesh

In Bangladesh Siddiquie (2014) conducted a research on Scopes and threats of Mobile Financial services in Bangladesh in his result he shows that Mobile financial service has a huge scope in Bangladesh.

Rahman, Abdullah, and Tooheen, (2012) Conducted a research on Mobile Money in Bangladesh in this research most respondents thought that the cost of sending and receiving money was very cheap. When asked about the main benefit of using mobile money transfer system, (77.7%) responded that mobile is faster than other methods (speed). The survey results show that mobile money transfer service has spread to a selected non-urban area in Bangladesh.

2.4. Theoretical Discussion

This section gives a brief overview of on theory used by the researcher to describe electronic/ Mobile Money Transfer service. Here researcher used Technology Acceptance

Model (TAM). TAM was proposed by Davis (1989). This model theory is relevant to this study because here model explains how users come to accept and use a technology (Davis, 1989) which directly effect to satisfaction of the user's and the performance of EMTS.

2.5. Theoretical Backgrounds:

Electronic money transfer procedures are essentially information technology (IT) procedures and channels through which users make various transactions like sent and withdraw. Studies show that the acceptance to use the electronic money transfer varies with the context in which users are able to use the electronic (mobile) payment procedure. It is a functional service adopted for utilitarian reasons (Khodawandi, Pousttchi and Wiedmann, 2003 cited in *ibid*). In the last two decades, various established and tested theories and models have provided some theoretical frameworks for research in the acceptance of information technology and information system (IT/IS). According to Tan, et. al (2011), these include the Theory of Reason Action, TRA (Fishbein & Ajzen, 1975 as cited Anthony & Mutalemwa; 2014), Technology Acceptance Model, TAM (Davis, 1989 cited in *ibid*), Theory of Planned Behavior, TPB (Ajzen, 1991 cited in *ibid*), Diffusion of Innovation, DOI (Rogers, 1995 cited in *ibid*), Technology Acceptance Model 2, TAM2 (Venkatesh & Davis, 2000 cited in *ibid*) and the Unified Theory of Acceptance and Use of Technology, UTAUT (Venkatesh et al., 2003 cited in *ibid*).

2.6. Technology Acceptance Model (TAM):

Among the various established and tested theories and models of information technology and information system (IT/IS), the technology acceptance model (TAM) is believed to be most robust, parsimonious, and influential in explaining IT/IS adoption behavior (Davis, 1989; Davis et al., 1989; Igbaria et al., 1995; Mathieson, 1991). TAM was proposed by Davis (1989). It introduced two important constructs—perceived usefulness and perceived ease of use (www.web page.com TAM theory accessed: 13.02.2015).

2.7. TAM: Perceived Ease of Use and Perceived usefulness:

The studies on the adoption and acceptance of a new technology reported in Tan et al (2011 as cited Anthony & Mutalemwa; 2014) such as from the perspective of mobile commerce (Wuo & Wang, 2005 cited in *ibid*), digital library (Hong et al., 2001/2002

cited in *ibid*), internet banking (Pikkarainen et al., 2004 cited in *ibid*), personal digital assistant (Arning & Ziefle, 2007 cited in *ibid*), mobile shopping (Lu & Su, 2009 cited in *ibid*) and mobile internet (Cheong & Park, 2005; Kurnia, *et al.*, 2006 cited in *ibid*), indicate that perceived ease of use and perceived usefulness are important success factors.

Davis (1989:320 as cited Anthony & Mutalemwa; (2014) defines ‘perceived ease of use’ as the degree to which the user believes that using a system would be free of effort (i.e. is it easy for me to use this tool?). ‘Perceived usefulness’ is defined by the same author (*ibid*) as the degree to which the user believes that using a system would enhance their job performance i.e. is it beneficial for me to use this tool for this work task? ‘Job’ can be replaced by ‘everyday life’ with regards to m-payments.

Actually, TAM was easier to use and provided quicker and cheaper method of collecting information, which is consistent with what Davis, Bagozzi and Warshaw. TAM has received praises from earlier researchers on its contribution towards our understanding into consumer behavior. Lu et al (2003, p.207) states that: “Throughout the years, TAM has received extensive empirical support through validations, applications and replications for its power to predict use of information systems”. Also, Legris et al (2003, p202) conclude that “TAM has proven to be a useful theoretical model in helping to understand and explain user behavior in information system” (<http://www.web page TAM Theory.com> accessed: 13.02.2015).

2.8. Analytical Frame work

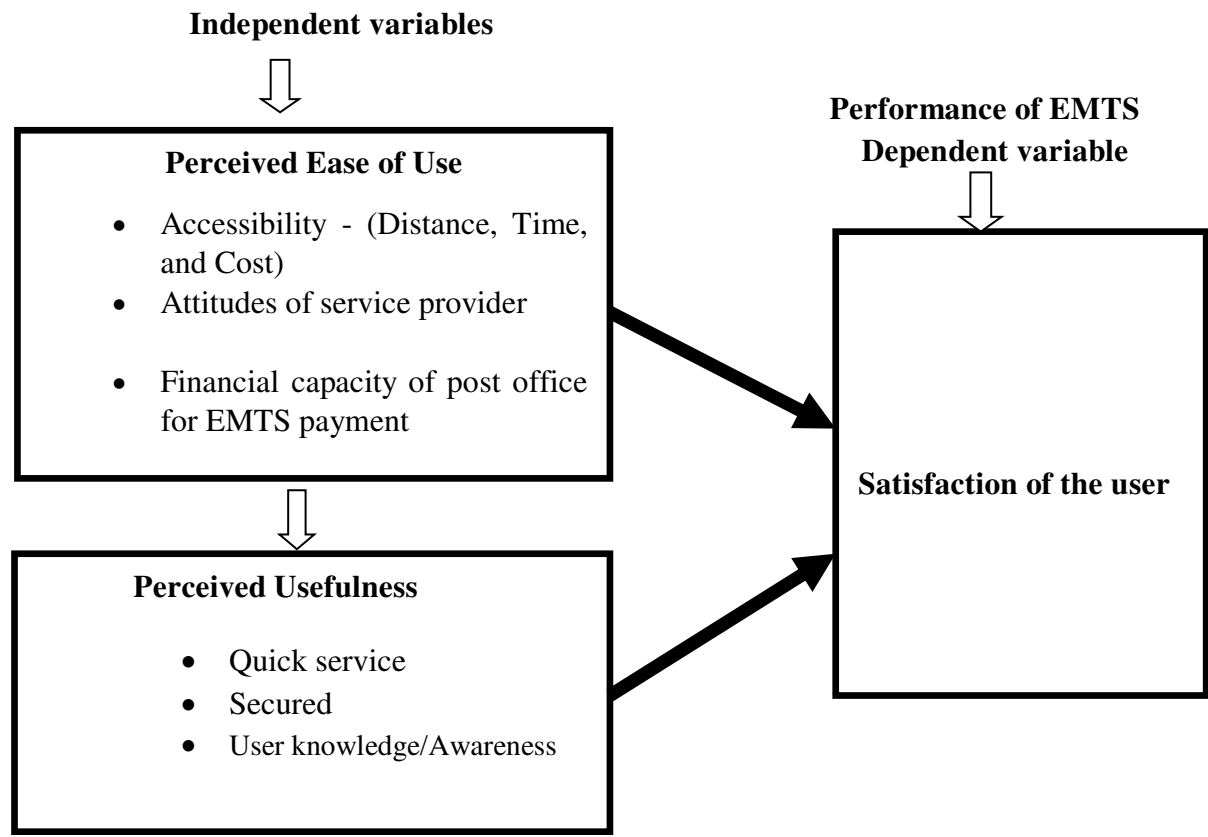
This research focused on the performance of electronic money transfer system (EMTS) from the user’s satisfaction view point. In today’s environment the satisfied user’s are more loyal to the organization otherwise they switch to other organizations. So for the sake of this we are going to use the explanatory variables that describe the different dimensions of a satisfied customer. Electronic payments service usage by user and researcher applies the Theory of Technology Acceptance Model (TAM). TAM is a theoretical model that explains how users come to accept and use a technology (Davis, 1989). The model suggests that when users are presented with a new technology, a number of factors influence their decision about how and when they will use it as cited Mbogo; (2010). And TAM’S two factors (perceived usefulness and perceived ease of use) are considered to be the primary determinants for adopting and using a new technology

and they are influenced by others indicators. Perceived ease of use directly affects perceived usefulness and both determine the user's attitude towards use, (behavioral intention to use -BIU) and eventually to the actual use of the system (Viehland and Leong, 2007 cited in ibid). These two are influenced by other variables such as security concerns, cost, convenience, and satisfaction Lu, Yu, Liu and Yao, (2003 as cited Mbogo; 2010).

User's satisfaction is the important factor for the long term success of a service. The provision of high quality service to customers is necessary for their survival and the success in today's global and competitive environment (Wang, Han, & Wen, 2003). The study has identified a couple of variables that are indirectly effect to the user's satisfaction which is the dependent variable of the study. And TAM's two factors influenced by some variables and indicators like, Perceived Ease of Use influenced by its variables and indicators such as accessibility: distance, time, and cost. Financial capability of post offices for EMTS payment and attitudes of service provider. And Perceived Usefulness influenced by its variables such as Quick service, Secured service, user's awareness about the service. So, these variables will affect directly to user's satisfaction. Consequently, TAM has chosen here as the appropriate model for this research.

A simple analytical framework showing the relationship between the variables is presented in the figure 2.9 below.

Fig 2.9: Analytical Framework



Source: Constructed by the Researcher

Followed by Davis, F 1989, TAM theory (www.webpage.com accessed: 13.02.2015)

2.9. Definitions of variables:

Dependent Variable (Performance of EMTS):

In this study, dependant variable is Performance of EMTS. Here EMTS performance will be measure from only on the basis of user's satisfaction. How well EMTS service is going on. Whether EMTS able to meet its user's exceptions. To evaluate the satisfaction of the user's; it is require to examine the service whether EMTS service is easy to use and useful to it's the users.

And independent variables are also measurable by some indicators which are given bellow.

Perceived Ease of Use:

Perceived Ease of Use refers easy Accessibility which means ability to reach the required service,

Accessibility:

It mainly focuses on how service providers make their services accessible to the users. This variable properly linked with the objectives of the research. The main objective of the research is to evaluate the performance of EMTS on the basis of user's satisfaction. In this connection the first and foremost independent variable has been identified to be the accessibility of the service. This term in fact will help to explore the Dependent variable which is satisfaction of user's. Here to examine the real nature of EMTS service some indicators are required like

- a) Time
- b) Distance
- c) Cost.

In this research the above mentioned indicators are required for independent variable which is 'accessibility of the service'.

For ease of use: it requires easy accessibility low cost, less time, less distance, and positive attitudes of service provider and financial capacity of post office for payment. Here to examine the real nature of EMTS service whether it is easy or not some indicators and variables are required like Distance, Time and Cost, sufficient amount money in post office for the big or more transaction and Attitudes of service provider.

Distance: Here Distance refers customer residence from the post office. How far is post Office from the customer residence?

Time: Time means the required time to get the service. How long it take to get the require service.

Cost: Cost refers the transaction costs of the service and the transport cost of the customer for the service.

Attitudes of service provider: Attitudes of service provider means how have service providers responded towards the service seekers with the provisions of EMTS service; Friendly, rude or indifferent attitudes.

Financial capacity of post office for payment:

What is the authorize balance of post office; is post office financially capable to give payment or is there sufficient amount of money in post office to give require payment.

Perceived Usefulness:

Perceived usefulness refers

- Security which means- well protection of the EMTS which is ensured by using pin code so that private information would not disclose, and ensures to remit during service time
- Users “knowledge/Awareness” means-Users or Customers knowledge about the available EMTS service, for Customers Awareness of the service is there any publicity?
- Quick service refers remittance within a few minutes to the desire locations where beneficiaries can collect and use it instantly.

Table 2.10: List of Variables and Indicators

Dependent Variable		Indicators	
Performance of EMTS		Satisfaction of user's	
Independent Variables		Indicators	
Perceived Ease of Use		Accessibility - (Distance- Short or long, Time-total time for the service, and Cost- transaction and the transport cost),	
		Authorize balance of post office; is post office financially capable to give payment or is there sufficient amount of money in post office to give require payment.	
		Attitudes of service provider Positive, negative indifferent attitudes or Friendly, rude or indifferent attitudes.	
Perceived Usefulness		Quick service: remittance within a few minutes. Security-well protection by pin code, Customer's knowledge: Customers Aware, publicity.	

The above mentioned variables and indicators helped the researcher to achieve the research Objectives.

2.10. Hypotheses:

With the help of the theoretical understanding and then the formulation of the analytical framework the study, thus, has hypothesized a number postulates. The hypotheses are closely related to the performance of the EMTS services. Five hypotheses are formulated on relating dependent variable with the help of theory Perceived ease of use and perceived Usefulness.

Perceived Ease of Use:

H 1= Easy accessibility of the EMTS service may positively influence the performance of the service.

H2= Positive attitude of service provider may ensures the performance of EMTS service.

H 3= Higher the financial capacity of post office for payment may positively influence the performance of the EMTS service.

Perceived Usefulness:

H4= High security of the EMTS service may positively influences the performance of the EMTS.

H5= Quick service delivery may positively influences the performance of the EMTS service.

2.11. Conclusion:

In this study, the researcher used Technology Acceptance Model (TAM). Technology Acceptance Model helped to conceptualize the performance of EMTS service. And this chapter gave an idea about different theoretical concepts used in the study. Moreover, operational definitions of the variables and indicators were also provided. A clear analytical framework was constructed to simply the understanding the relations between the variable.

Chapter Three: Research Design and Methodology

3.1 Introduction:

This chapter provides detailed concept of conducting the research. In other words, research methodology applied in the study is dealt in this chapter. The nature of the problem to be studied and research question to be answered are the guiding pillars to decide what approach and strategy would be employed to pursue a research. A combination of content analysis, questionnaire survey and in-depth interview, case study are used in the research. The purpose of using of different methods is that it minimizes the risk of biasness in the study and thus works as a reliable tool for research.

3.2 Research Design:

Research design refers to the plan on how the researcher systematically collected and analyzed data needed to answer research questions. It is a framework or roadmap through which a research process is conducted to explain the social phenomena under investigation (Kothari, 2000). Fred Kerlinger (1986 cited in Kumar 2005) defines a research design as a plan, structure and strategy of investigation so conceived as to obtain answers to research questions or problems. It includes an outline of what the investigator will do from writing the hypotheses and their operational implications of the final analysis of data. So, the choice of an appropriate research design is essential for a scientific study. The study focused on understanding the performance of Electronic Money Transfer Service (EMTS) of Bangladesh post office on the basis of user's satisfaction. For this, descriptive and analytical research designs have been used. This is because descriptive research design helps to describe the current practices and events while analytical research design enables to establish relationship between variables (Aminuzzaman 1991).

3.3 Research Method

According to Creswell, there are three approaches in conducting scientific research, i.e., qualitative, quantitative and mixed approach (Nayem 2010). Best and Kahn (2006) says research can be qualitative, if it describes events and persons scientifically without the use of numerical data while quantitative research consist of research in which data can be analyzed in terms of numbers. Mixed approach is an approach which combines both the

qualitative and the quantitative methods. The method used in the study is mixed method because it had included qualitative and quantitative approaches both. The reason behind using mixed method is that, it overcomes the disadvantages/benefits, the advantages of qualitative and quantitative methods. Using mixed method helped to minimize the weakness of single method and ensured the validity of gathered data. Questionnaire survey is the quantitative method while interview is the qualitative methods which were used in the data collection process.

3.4 Study Population and Sampling

Study population relates to the service seekers and service providers of EMTS service and this section further elaborates the details about sample size and method of sampling.

Sample Size

The size of the sample was 66. The research has to be conducted with the service seekers and providers both, so the total sample size was divided among them. Out of 66 samples, 60 were from service seekers while 03 were from service providers and 3 were cases. The detail of the sampled service seekers and provider are presented below. And see the table: 4 in annexure the sources of data collection.

Table-3.4: Methods and sample size:

Type of respondents		Information collection method	No. of respondents
Service Providers	1. Post master	In depth interview	1
	2. EMTS operator	In -depth interview	1
Service seekers	Customers or users	Questionnaire Survey	3*20=60
Service Implementer	Director General	In depth interview	1
Case study			3*1=3
Total sample size : 66 Total Questionnaire for customer or service user (3*20) = 60 Total In depth interview = 03people Total Case study = 03			

Sampling Method

Basically, the study used purposive sampling method so as to get the best information to achieve the objectives of the study. This method gave flexibility to the researcher to pick up only people who are likely to have the required information and be willing to share it.

Moreover, the sampling method helped to ensure representation of different variation of service providers as well as service seekers. In other words, heterogeneity in the composition of sample of service seekers and providers (age, sex, education, profession and senior-junior officials,) were attempted to maintain as possible .

3.5 Research Location:

The study will conduct the survey on 3 districts Dhaka, Moulvibazar and Tangail. Data will collect from Postal Directorate, Dhaka and Dhaka university post office and also from Moulvibazar and Tangail Head post office.

Dhaka:

Dhaka is the capital and largest city of Bangladesh. It is a mega city of about 8.5 million people, with an area of about 1353 sq. km. becoming the hub of the nation's industrial, commercial, cultural, educational and political activities. Area: 815.85 Sq. kilometers (approx.) Population: Seven million (approx.) (<http://www.bizbangladesh.com> accessed: 27.03.2015)

Moulvibazar District:

Moulvibazar District is a district of Bangladesh which located about 212 kilometers north eastern of Dhaka. Moulvibazar District was established in 1984. It is in [Sylhet Division](#) **Total Area:** 2,799.38 km² (1,080.85 sq mi). **Population:** Total Population: 1,919,062 (2011 census), Density: 690/km² (1,800/sq mi). **Postal Code:** 3200 (<http://www.districts of moulvibazar.gov.bd>. webpage accessed 27.06.2015)

Tangail District:

It is central region of Bangladesh. It is a part of the Dhaka division. Tangail district was established in 1969. Area of Tangail: 3,424.39 square kilometers (1,322.2 square mile) Population of Tangail: 3,253,961. Density of Tangail: 950.2/ square kilometers (2,461.1/ square kilometers). Literacy Rate of Tangail: 29.6%. (<http://www.districts of Tangail.gov.bd>. webpage accessed 27.03.2015)

3.6 The reason for choosing these areas:

Dhaka university post office:

The reason for choosing these areas are because Dhaka University is student area where most of the student doesn't have bank account to receive money which is sent to them from far distance by their parents. Along with the Students others user also use this post office for EMTS service. It is a sub post office and this post office is directly controlled by Deputy Post master general (DPMG) North Dhaka. This office is run by third class post master who is a third class employee of Bangladesh post.

Due to time constrain researcher also selected Moulvibazar and Tangail districts Head post office as a sample for data collection.

Definition of Head post office:

There are two categories head post offices in Bangladesh post; one is A graded post office another is B graded. Moulvibazar and Taigail head post offices are A graded head post office.

Definition of A graded head post office:

Normally entry level BCS (postal) cadre officers are posted in A graded head post offices. And they are called first class post master and office is first class post office and it is also called the head post office in the District.

Tangail district Head post office:

Tangail district head post office is the oldest post office and nearest to postal Directorate Dhaka and district also in the Dhaka Division. Here researcher wants to see how EMTS is running in the closest district head post office Tangail. This head post office is A graded and oldest post office. This post office is run by first class post master who is belonging to BCS (postal) cadre. This office is controlled by DPMG Tangail and top management PMG central circle Dhaka. And others post offices in the district are depending on this head post office

Moulvibazar Head post office:

This office was established in 1968. Firstly it was B graded post office, in 1996 this post office was converted into A graded office. This office is far away from the postal directorate it is about 212 kilometers from Dhaka and district is mainly famous for natural beauty and tourism. Here researcher wants to see how EMTS is running in the longest distance district and tourism area like Moulvibazar head post office. It is A graded post office. This post office was established in 1968 and run by first class post master who is belonging to BCS (postal) cadre. This office is controlled by DPMG Sylhet and top management PMG Chittagong circle. And others post offices in the district are depending on this head post office.

3.7 Sources of Data:

Generally, there are two different sources of collecting data, viz., primary sources and secondary sources. The research is based on both primary and secondary sources of data. Primary sources of data are the first hand data to be collected from study area. The study had applied two tools for collecting primary data, namely questionnaire survey, interview and case study.

Primary sources were the main source to validate the hypothesis by establishing the correlation between the variables under study. Rightly, it turned out to be the greatest asset of the study.

As secondary sources of data are in the form of publish documents. The study used numerous sources to collect secondary data, such as from different relevant publications, dissertations, books, journal articles, reports, websites etc. Secondary sources were very useful to analyze the Relationship between dependent and independent variables. It helped to gather information about the present status of EMTS service.

Primary Data:

1. The information, which will be gathered through interview from service provider in post office and service supervisor from postal Directorate.
2. Personal observation.
3. Face to face conversation with the clients
4. and questionnaire survey

Secondary data:

The secondary data of this report will collect from ministry of post Telecommunication and Information Technology and postal directorate.

Secondary Sources:

Secondary data will be collect in the following ways:

1. Data gathered within the postal directorate and ministry of post Telecommunication and Information Technology website.
2. Internet sources.
3. Annual reports.
4. Official documents

3.8. Primary Data Collection Techniques

For answering the research questions, employing only one method of collecting data would be unscientific. Multiple techniques for collecting data, thus, were used in this study. The major data collection techniques used in the study was questionnaire survey, interview, case study and content analysis. This section further elaborates a detail note on those data collection techniques.

Questionnaire Survey:

The data collection method was basically questionnaire survey method. In order to gather required information, effective and reliable questionnaire was developed. In Questionnaire there will be include necessary question to gather the first hand information about the indicators mentioned in the analytical framework. The question pattern was close-ended where answers were provided, among which the respondents were asked to choose. In addition, open-ended questions were also asked, which provided the flexibility to the respondents to express their opinions.

Preparation of Questionnaire:

As the study was designed to understand the performance of EMTS service, two sets of questionnaire were prepared: one set for service providers and another for service seekers. And thesis supervisor has provided valuable suggestion which helped to frame questionnaire to meet the objectives of the study. Different statements were placed for the respondents to know their attitude which was measured in a strongly agree to strongly

disagree Scale Format. Opinions of respondents on different aspects of services were also analyzed by giving different scale.

Pilot Testing

Two days were allocated to undergo pilot testing of the questionnaires. The pilot testing helped to get timely correction and inputs in the questionnaires. Three service providers were asked the questions from questionnaire, and on the basis of their responses some of the questions were redesigned. Likewise, a couple of service providers were consulted to answer the questionnaire and they provided valuable suggestions which were later incorporated in the final version of the questionnaire.

Administering Questionnaire

The purposively selected samples (60 service seekers and 03 service providers) were interviewed utilizing the structured questionnaire. Adequate time was taken for explaining the purpose and objectives of the study to every respondent.

- As the questionnaire was drafted only in English, It was a big challenge for the researcher to make understand the illiterate respondents, then researcher translated the questions in Bengali which helped much to make understand the respondents, but in most of the cases instead of respondent, the researcher herself had to fill up the responses in the questionnaire.

3.9 Qualitative data collection

Interview

In addition to questionnaire survey, interviewing a couple of bureaucrats were the source of primary data in the study. At first interview guide was prepared with the consultation of supervisor. Interview was carried out on the second week August, 2015 by the time of which questionnaire survey was already finished. Thus, on the basis of the interview guide and primary result of the questionnaires findings, three in-depth interviews were carried out to understand the performance of EMTS service. For this, Gazetted and non-gazetted service providers were interviewed. One EMTS service operator, one post master and Director General were interviewed whose information helped to understand the present condition and performance of EMTS service.

able 3.9: Sample Size of Service Provider:

Service Providers	Post master (Tangail) And EMTS operator (Moulvibazar)	In depth interview	1
		In -depth interview	1
Service implementer	Director General	In depth interview	1

=03

Cases

In order to get more clear and precise information about the performance of EMTS this study was undertaken three case studies of EMTS users. During the case study, few examples of the typical cases of success and failure stories related were collected.

3.10 Content Analysis

Content analysis, a type of secondary data analysis, is used to analyze text, including, interview transcripts, newspapers, books, manuscripts and Web sites to determine the frequency of specific words or ideas. The results of content analysis allow researchers to identify, as well as quantify, specific ideas, concepts and their associated patterns, and trends of ideas that occur within a Specific group or over time (See: [http:// www.ministry of post, telecommunication and information technology web page](http://www.ministryofpost,telecommunicationandinformationtechnology.gov.bd) accessed 16 August 2015). During the study, rigorous content analysis was done by reviewing different published and unpublished books, journals, research works, articles, notes, newspapers, magazines etc

3.11 Validation of Data:

To confirm validity and reliability of the collected data, data collected from one method was cross checked with another method. For instance, data gathered from questionnaire survey were cross checked with interview and secondary data.

3.12 Data Analysis:

First of all, the gathered raw data were coded and tabulated, and then the data were analyzed by using different analysis techniques. For statistical analysis, the study used Stata 9 tool. Different simple mathematical tools like tabulation, percentage, frequency

were used. Cross tab were also used to analyze two variables (dependent and independent variables), to determine if there is a relationship between them.

3.12.1 Cross Tabulation

Cross tabulation is the process of creating a contingency table from the multivariate frequency distribution of statistical variables. Cross Tabulation which is also known as Pivot Table or Contingency Table and is an effective means two show relationship between two or more than two variables. Cross tabulation effectively show the relationship between independent and dependent variables. In this study Cross tabulation has been used to measure relationship between Dependent and Independent variable.

3.12.2 Chi Square Test

One of the applications of chi-square, X^2 - tests as a test of independence, is useful to find out whether two or more attributes are associated or not. Chi square test gives the relationships between the attributes at a certain level of significance rather than its strength and direction. In order to test whether or not the attributes are associated, we need to calculate value of chi square, and then compare with the tabulated value at a certain level of significance.

Source: (See: http://www.statsdirect.com/help/parametric_methods/utt.htm accessed: 13th October, 2015).

3.13 Limitation & challenges of data collection

During the field study I experienced some new & exciting things during the field study which explained below:

1) Respondents are hardly seen: In practically when I went to field for survey I saw very limited users are using the service. Researchers had to stayed whole day in post office for the respondents. Respondents are hardly seen for EMTS. When I took in depth interview of service providers they told per day 3to 4 users are using the service.

2) Reluctance in providing information: Rural people are not so conscious about countries development issue. So, they are not ready to meet any survey question

regarding development related study. Beside this, they feel comfort to be busy with their works.

3) Limited time: Limited time is another constraint in the field work. The time given for data collection was too short. For social science study, researcher needs more time for in-depth data collection. To structure the design in the light of development, extra time is essential. Personally I feel, if I had more time, it would help me to get more reliable data.

3.14 Chapter Conclusion

Research methodology is an indispensable part of a research. In this chapter, the researcher has provided a concrete description about methodology which applied in the study. And also about the data source, sample size and analytical toolkits. These references will be drawn frequently to explain the results.

Chapter Four: A Brief Account of Bangladesh Post office-Electronic Money Transfer Service

4.1 Background

The Electronic Money Transfer System (EMTS) is a mobile-- short message service-- and Web based remittance support system that enables mobile phone users to send money (electronic money order) up to BDT 50,000 at post offices without relying on formal banking systems. This mobile payment system was developed by the public-private partnership of Bangladesh Post Office, software consultants, and a private mobile phone operator (Banglalink). Post office and private consultants jointly built the system, while Banglalink provided 500 mobile phone sets to all employees in post offices (source: EMTS section, Director General office dated 03.10.2015). Post office staffs were trained to feel comfortable working with the EMTS and a support team of engineers, programmers, system analysts, and others at the call center helped customers use EMTS smoothly (Islam, 2012, pp. 13-14). Prime Minister inaugurated the EMTS on March 2010 that was opened to the public two months later. The EMTS started its' service in 100 post offices in urban areas on May 2010 and expended service areas to 2,750 post offices (27.8% of the total 9,886) as of September 2013 (cited in ibid). The sender can send the money within a minute and recipient/beneficiary can collect it instantly. Both the sender and the recipient get confirmation of the remittance and disbursement as soon as it is made in their mobile phones (source: EMTS section, Director General Office, Postal Directorate Dhaka, dated 03.10.2015).

4.2. Area Coverage

This service is available in all important post offices of the country. Presently 2750 post offices provide the EMTS which is covering all district, upazila/thana and important/busy rural post office locations. Every month hundreds of post officials are being trained and the service is expanded to those locations (source: EMTS section, Director General Office dated 03.10.2015).

4.3 EMTS Tools/Devices

Bangladesh Post maintains a server and call center to monitor and support the service. All Electronic Money Transfer Service locations (post offices) are equipped with computer, internet connectivity and/or mobile phones which are used to send the issue or payment request to the server(source: EMTS Project, Director General office dated 03.10.2015).

4.4 EMTS Software

The EMTS software has been made by the joint effort of Kamrul Hasan, a freelance Bangladeshi software consultant, and a team of the Postal Department. Bangladesh Post developed the software by their own people so that they can keep the cost low for the common people. Huge popularity of EMTS has made the service as one of the major milestones of the government's endeavor in building digital Bangladesh (Source: EMTS Project, Director General Office of Bangladesh post office collected 20.10.2015).

4.5 Procedure

The sender goes to the post office and fills up an issue form (EMO-1) giving required information like sender name, address, mobile phone number, recipient's name, address mobile phone number, amount of money to be sent etc. The post office staff sends the information to the central server through the computer or official EMTS mobile phone. When the request is accepted and confirmed by the server through issuing SMS generating a 16 digit unique PIN to sender's mobile phone and a separate confirmation message is sent to issuing post office. The sender shall inform the recipient to collect the money from his/her nearest post office. The recipient goes to the post office and again fill up the disburse form (EMO-2) and claim the money showing the PIN. The post office counter operator verifies the information given by the recipient from server with those used earlier by sender; if everything is match the disbursement procedure is made. As soon as the disbursement is completed the sender is again confirmed by another SMS generated by the server (source: EMTS section, Director general office dated 03.10.2015).

4.6. Main Features of Bangladesh Post office-Electronic Money Transfer Service

EMTS is one of the money transfer system of Bangladesh Government.

1. Remittance in a minute.
 2. User Friendly- adoption of mobile phones & applications
 3. Maximum Area coverage: Locations distributed throughout the country (presently in 2750 post offices), to be expanded to all Post Office locations
 4. Transaction security ensured by a 16 digit auto PIN generation mechanism. High security maintain with Auto Database Back.
 5. Independent of Mobile Operator-customer enjoying mobile operator's service can use this service.
 6. EMTS devices not specific to power sources like electricity -have freedom of using any Source of Power (electricity, battery, solar charger).
 7. Ensure customer satisfaction-Daylong well acquainted Help Desk Service.
- (Source: EMTS section, Director General Office dated 03.10.2015).

This is the general description of EMTS service. But in this process, Some money orders may not be delivered; in particular, when (1) a money order is abnormally issued due to operator's mistake and others, disburse the money, (2) a sender loses the PIN or fails to sent it to the recipient correctly, (3) the recipient does not want to get the money order disbursed, (4) the money order is not disbursed within 14 days after the issuance and thus is automatically locked by the EMTS server.

(Source: www.ministry of post, telecommunication and information technology web page accessed: 28.08.2015)

4.1 EMO FORM=01, for issue or transfer:

Initial Step For EMTS

➤ For issuing **Money Order** Customer have to fill up the following form

The diagram shows the EMO FORM=01 with the following fields highlighted by callouts:

- Beneficiary Name
- Beneficiary Mobile No.
- Sender Name & Address.
- Sender Mobile No.
- Requested Amount TK.
- Post Code
- MO Serial No..
- Issue Date
- Sender Signature and Date
- Confirmation of amount received
- BPO agent's signature & seal.

Source: www.Ministry of post. Telecommunication and information technology web page govt.bd accessed 28.08.2015).

4.2 EMO FORM=02 for disburse or payment:

Disbursing Money Order

➤ For disbursing **Money Order** Beneficiary have to fill up the following form

The diagram shows the EMO FORM=02 with the following fields highlighted by callouts:

- Sender Address
- Sender Name
- Sender Mobile number
- Beneficiary Name
- Beneficiary Address
- Secret PIN No.
- Post Code
- Issue Date
- Beneficiary Signature and Date
- Confirmation of amount received
- Recipient Signature and Date
- BPO agent's signature & seal.

Source: www.Ministry of post. Telecommunication and information technology web page govt.bd accessed 28.08.2015).

4.3 Figure of EMTS procedure system:

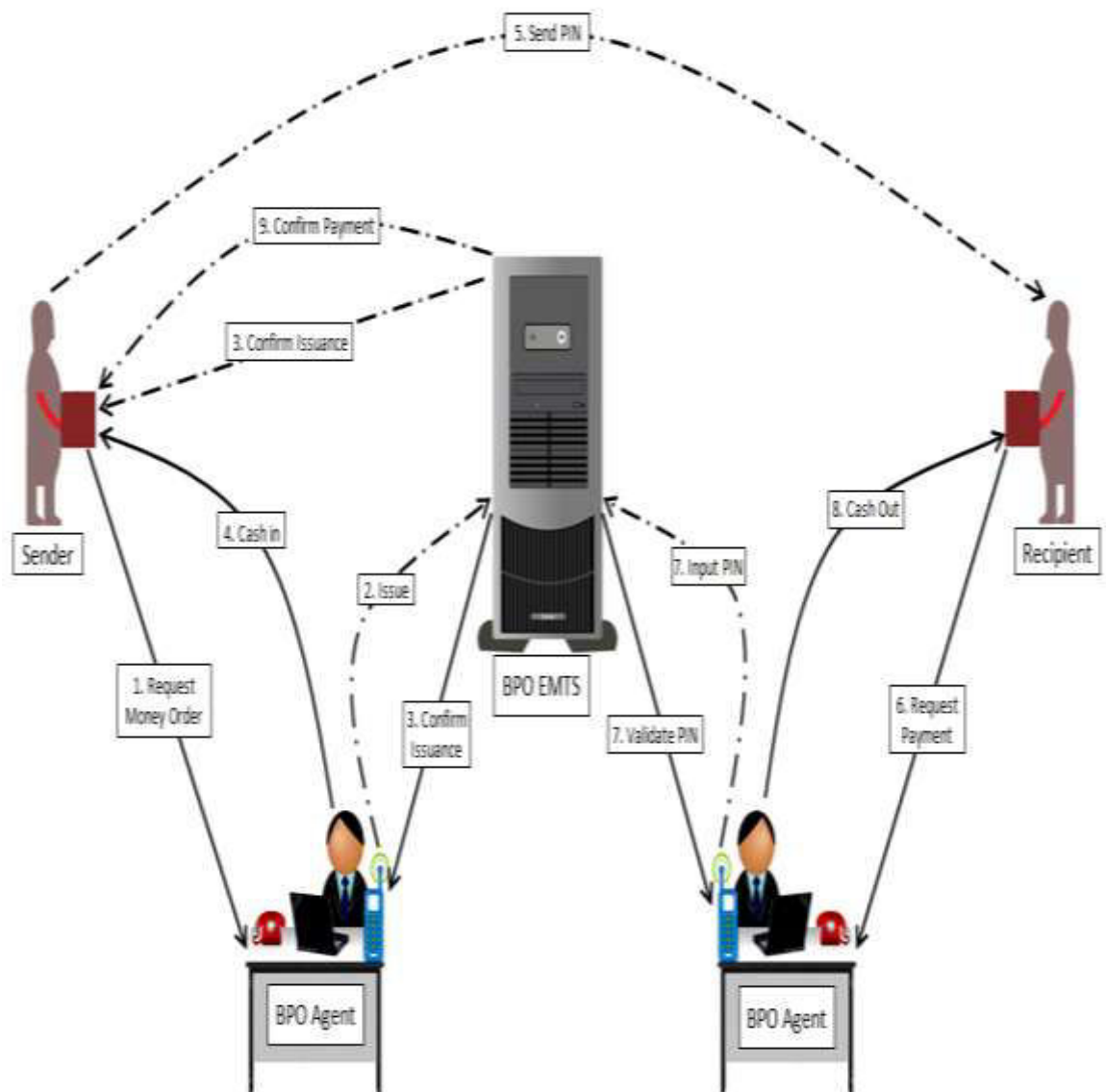


Figure 3: Work flow of the Electronic Money Transfer System.

Table 4.10: Commissions for Electronic Money Order (BDT)

Amount of Money Transferred	Commission for post office	Charge of Electronics cost for Banglalink	Total Cost
100 ~ 1,000	20	7	27
1,001 ~2,000	30	7	37
2,001 ~,3000	40	7	47
3,001 ~4,000	50	7	57
4,001 ~5,000	60	7	67
5,001 ~6,000	70	7	77
6,001 ~7,000	80	7	87
7,001 ~8,000	90	7	97
8,001 ~9,000	100	7	107
9,001~10,000	110	7	117

Source: Bangladesh Post Office Director General Office EMTS section, (2015)

4.11 Conclusion

The chapter, thus, provided a brief introduction about the Postal Electronic money transfer system which is new innovation of digital journey of Bangladesh government. It is one of the success histories of Bangladesh Government in Postal sector. Moreover, the chapter put light description about electronic money transfer system of Bangladesh Post office.

Chapter Five: Data Presentation and Analysis

5.1 Introduction:

This chapter presents the quantitative and qualitative findings and analyses of data which were gathered from questionnaire survey, interview and case study. This chapter details the results of the data analysis based on the data collected from the survey conducted. The demographic profile and the perception of respondents have been described though this profile has no significant effect on the study. To find out the satisfaction of the users on EMTS service, Cross tabulation, Chi square test and hypothesis test have been done between the individual variable and the satisfaction of EMTS service. The chi-square test has been done to test the strength of association and level of significance, respectively. P-Values less than or equal to 0.05% were considered statistically significant. And two factors of TAM's theory perceived ease of use and perceived usefulness has been analyzed in respect to the individual independent variables consecutively (accessibility-time, distance and cost, attitudes of service provider, Financial capacity of post for payment, Quick service, Secured, User awareness which are influencing the performance of the service from the user's satisfaction view point.

Tables and figures are used to have the analysis for every parameter of the variables. The related questions which are used to address the variables are mentioned at the bottom of each analysis tables and figures.

The details results of collected data that is quantitative and qualitative findings are given below:

5.2 Study area

The study was conducted only on three study areas: Moulvibazar Head post office, Tangail Head post office and Dhaka University Sub Post Office and the respondents were the service seekers and the service providers. For the service seekers it was survey method and for the service provider it was interview method. Total 60 respondents were taken for questionnaire survey with close ended and open ended questions, 3 service implementers were interviewed according to the checklist of the questions, and 3 cases were also taken to have some in depth idea about the EMTS service.

Table 5.1: Study area and distribution of respondents

Study area	Frequency	Percent (%)
DU post office	20	33.3
Tangail HPO	20	33.3
Moulvibazar HPO	20	33.3
Total	60	100.0

Field Survey 2015, (n=60)

Data had been collected purposively from the above three study areas and respondents are taken 20 from each post office and table 5.1 has presented the summary of study area.

Cross table 5.2: Study area and Satisfaction from EMTS service

<i>Study area</i>	<i>Satisfied from EMTS service</i>			
	Study area	Not satisfied	Satisfied	Total
	DU	6.7%	26.7%	33.4%
	Tangail	10.0%	23.3%	33.3%
	Moulvibazar	16.7%	16.6%	33.3%
	Total	33.4%	66.6%	100%

Chi-square value is 4.200 and critical p-value is 0.1220 (n=60)

The above Cross table 5.2: presents that study areas have a very small affect to the satisfaction of the user's of the EMTS Service. It is found that 26.7% users of Dhaka University area are satisfied where as only 16.7% users are satisfied in Moulvibazar area and 23.3% in Tangail area. So, the variation of the satisfaction is not significant. From chi-square test and individual hypothesis test, it is found that there is no significant relation between study area and satisfaction of the EMTS user's. (See in annexure: 5, 6 the cross tabulation chi-square value and hypothesis test).

5.3 Socio- economic and demographic characteristics of respondents

Socio- economic and demographic characteristics has been considered as Age, Gender, Education and Occupation. The table given below presents the Socio- economic and demographic characteristics of respondents.

Table 5.3: Socio- economic and demographic characteristics of respondents, of three study area July–August, 2015 (n=60)

Socio- economic and demographic characteristics	Frequency	Percent
Age		
Below 20	1	1.7
21-30	16	26.7
31-40	23	38.3
41-50	20	33.3
Gende		
Male	41	68.3
Female	19	31.7
Occupation		
Self employed	10	16.7
Employed	27	45.0
Student	17	28.3
Others	6	10.0
Education Level		
Illiterate	3	5.0
Below Secondary Level	8	13.3
Secondary Level	1	1.7
Higher Secondary Level	13	21.7
Bachelor Degree or higher	35	58.3

Source: Field survey 2015

EMTS users were analyzed in the context of their Socio-economic and demographic background (see table 5.3 in above). The data show that, majority users were in the age group 31-40 which is 38.3 % who are relatively middle age .Most of the users were Male 68.3%. In comparison to male, female are using less. Majority users were Employed 45 % and also Bachelor degree or higher educated which is 58.3%. In cross tabulation with Socio-economic and demographic background of the respondents and satisfaction of the users, it is found that Socio-economic and demographic background of the respondents have a very small affect to the satisfaction of the user's of the EMTS Service. From chi-square test and individual hypothesis test, it is found that there is no significant relation between Socio-economic and demographic background of the respondents and satisfaction of the users. (See annexure: 5 the cross tabulation 5.4-5.8 chi-square value and hypothesis test).

5.4 Frequency of EMTS service user

During survey, the researcher asked the service recipients regarding how often they use the EMTS service. In replying the question, weekly use 3%, monthly use 40 % and yearly use 57%. So, majority users are yearly which is 57 %. (See table 5.9)

Table 5.9: Frequency of use of EMTS services

Occasion	Frequency	Percent
Weekly	2	3.3
Monthly	24	40.0
Yearly	34	56.7
Total	60	100.0

Q. How often do you use EMTS service (n=60)

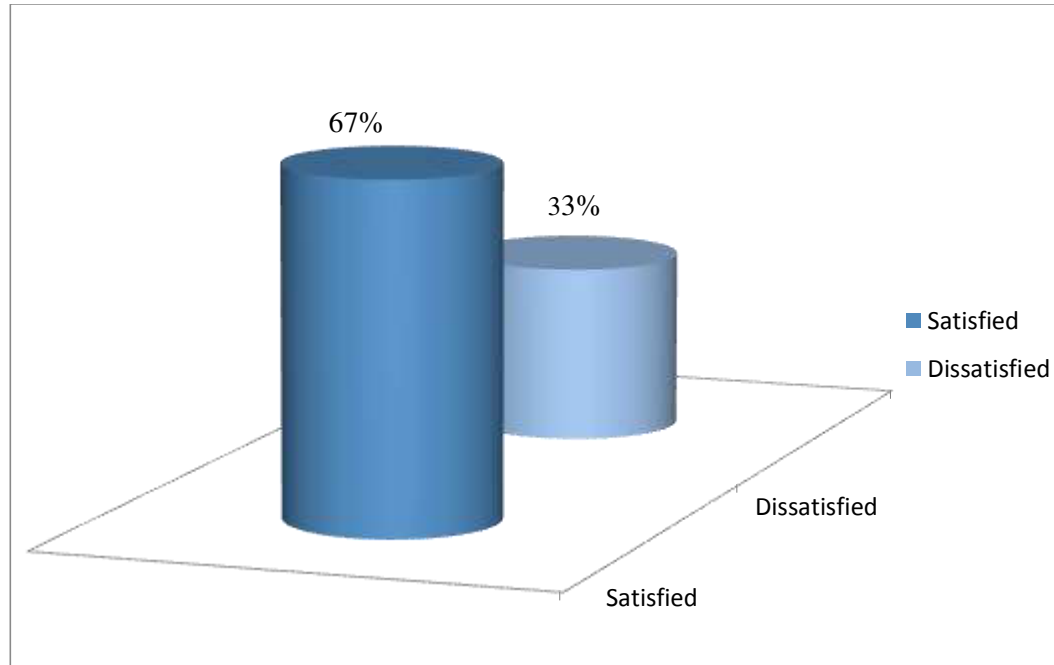
Indicator of Dependent Variable is Satisfaction of EMTS user's:

The performance of EMTS has been measured from satisfaction of the user's point in view.

5.5 Satisfaction level of EMTS user's:

During field survey respondents were asked the questions are you satisfied with the EMTS service? and told to fill the form in Likert Scale method 1 to 4 ranks as 'strongly Satisfied' and 'Satisfied' 'strongly dissatisfied', and 'Dissatisfied'. For easy of analysis 'strongly Satisfied' and 'Satisfied' are merge as 'Satisfied' 'strongly dissatisfied' and 'Dissatisfied' are merge as 'Dissatisfied' then it is found that :

Chart 5. 1: Satisfaction level of EMTS user's



Q. Are you satisfied with the EMTS service? (n=60),

The above Chart1 shows that 67% users were satisfied with the EMTS where as 33% were dissatisfied. So, it is found that majority users were satisfied with the EMTS. (See: Chart 5.1 in above is the summary of the Satisfaction level of EMTS user's).

But Secondary data and in depth interview revealed the reverse scenery about EMTS. The EMTS Central server report, 2015 June, express that after 2012-2013 Users of EMTS decreased a lot that is 31% to 10% and 10% to 4% and the revenue income of post office by EMTS service is also decreased 32% to 15% and 15% to 7% (see table 5.23 and 5.24 in annexure 5)

To cross check the server report 2015 June, Director General was asked about the EMTS service. In replying the question he said that,

“In the year 2010, post offices introduced the service of Electronic Money Transfer Service (EMTS) as an alternative to Money Order Service. After introduction of this service it was equally popular to both bank and unbanked population. Initially after its inception, the number of transactions under this service was round 40,000 daily. And it was main revenue income source of post office at 2011-2012. Due to the indifferent attitude of some officials and also for some institutional limitations some customers have lost their faith in postal EMTS service and in the same time Users of EMTS is decreasing day by day and the revenue income of post office by EMTS service is also decreasing ”.

This information is contradictory with the EMTS user’s satisfaction, the revenue income of post office and EMTS users are decreasing day by day; on the other hand users are satisfied with the EMTS. so, in depth analysis is require to find out the performance of EMTS service such as cross tabulation , chi- square test and individual hypothesis test.

Further he said,

“Still general people have faith on EMTS as it is a government service; however authority is trying to regain EMTS image amongst its users by introducing new innovative initiative every now and then. If these initiatives go operational in full force, I am hopeful that the postal EMTS service will be the best in market and if financial institutions follow the legal procedure, postal services will be popular.”

Accessibility:

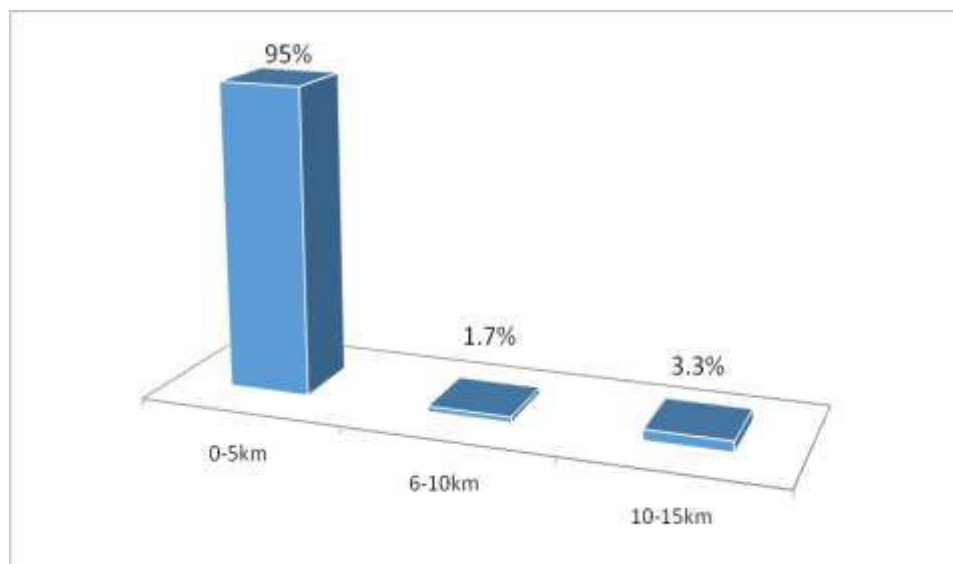
Accessibility is the first and foremost independent variable. This term will help to explore the Dependent variable which is satisfaction of the user's. To examine the real nature of EMTS service some indicators are required to analyzed.

- a) Distance
- b) Cost.
- c) Time

5.6 Distance

Distance is a major factor to use any service. Generally close distance encourage the users to use any service. In field survey, the researcher asked the service recipients regarding the distance how long it takes to travel for the EMTS service. In replying the question, almost all of the respondents (95%) informed they travelled 0-5 kilometers to receive the EMTS service. So, majority users are close distance areas people and chart 5.2 shows the summary of the distance.

Chart 5.2: Distance



Q. How long it takes you to travel for EMTS service? n=60

To Cross check respondent answer Qualitative data has been collected through in depth interview. The question was asked to the service providers (Q.6. Do you think that distance areas people are using the EMTS less than the closer areas people? Can you cite

any example please?). The service providers also mentioned that the EMTS service users are close distance areas people. As they told that

“Close distance areas peoples are using the EMTS service more than the distance areas peoples”.

As one of the respondents said,

“The Post Office is close to my work place and also close to my village home which is walking distance. Therefore, it is easy for me to sent money and also easy for my family to receive money by EMTS service.”

5.6.1 Distance and Satisfied from EMTS service

Cross table 5.10: Distance and Satisfaction from EMTS service

<i>How long it takes to travel for EMTS</i>	<i>Satisfied from EMTS service</i>			
	Kilometer	Not satisfied	Satisfied	Total
	0-5km	31.7 %	63.3%	95.0%
	6-10km	1.7%	0	1.7%
	10-15km	0%	3.3%	3.3%
	Total	33.4%	66.6%	100%

Field survey 2015

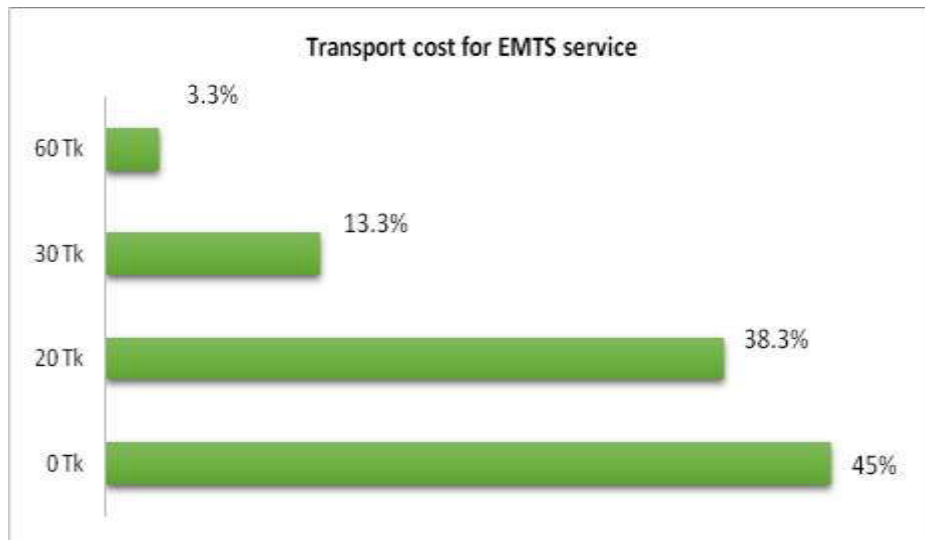
n=60

The above cross tab points out that there is an association between the distance and satisfaction. As the Cross table 5.10: revealed that 63.3% users are satisfied when they travelled only 0-5km, whereas only 3.3% users are satisfied for travelled 10-15 km. It is found that low distance areas users' are more satisfied than the higher distance areas user's. So, close distance for the EMTS service is enhancing the satisfaction of the user's and it is leading the better performance of EMTS.

5.7 Transport cost to avail the EMTS service

The service recipients were asked about the transport cost, how much money has to spend as a transport cost to access the service.

Chart 5. 3: Transport cost for EMTS service



Q. How much money you have to spend as a transport cost for the service? n=60

In replying the question, about half of the respondents (45%) said that they did not spend at all to access to the service. Still a large number of respondents (38.3%) had to spend 20 taka and some others spend (13.3%) 30 taka. (See Chart. 5.3 for Transport cost). So, the majority of the users had no cost for the EMTS services.

5.7.1 Transport cost and satisfied level from EMTS service

Cross Table 5.11: Transport cost and Satisfaction from EMTS service

Transport cost for EMTS service	Satisfied from EMTS service			
	Taka	Not satisfied	Satisfied	Total
	0	8.3%	36.7%	45 %
	20	15.0%	23.3%	38.3%
	30	10.0%	3.3%	13.3 %
	60	0%	3.3%	3.3%
	Total	33.3 %	66.6 %	100 %

Source: Field Survey 2015

n=60

The above table 5.11: reveals that the travelling cost has a significant effect to the satisfaction of the EMTS user's. It is found that 36.7% users are satisfied and they spent only (0) taka as a transport cost. Whereas 23.3% are satisfied when they spend 20 taka, 3.3% are satisfied and they spend 30 taka and only 3.3% are satisfied they spend 60 taka. The variation of the satisfaction is significant. It is found that the majority users were satisfied because they did not spend at all as a transport cost for the service. So, no travelling cost for the service is positively influences the performance of the EMTS service.

5.8 Waiting time for the service

The researcher asked the service recipients regarding the total for the service or how much time recipients spent for the service. In reply, majority of the respondents (58.3%) experienced that they waited half an hour for the service. (Chart 5.4 is the summary of waiting time for the service).

Chart 5.4: Waiting time for the service



Q. How long do you have to stand for the service? Field Survey, 2015 n=60

Qualitative data reveals different opinion about the time for providing EMTS service delivery. In depth interview of service providers were asked about how much time it takes to deliver the EMTS service (Are you able to deliver the service within a short time? If “No”, please mention the reason). In replying the question both informants responded positively. As one of respondent said with confidence,

“Most of the time, I can provide the service to the recipients within a very short time.”

In contrast, few respondents told that it is not often they receive quick services from EMTS because of several reasons. One of the reasons is the shortage of the available money in the Sub and branch post offices which increases the waiting time requires to receive the service. As one of the respondent spontaneously said,

‘Due to acute crises of money in Sub Post Office and Branch Post Office for payment, most of the time I have to come in Head Post Office for withdraw money which results me for wastage time and money.’

Cross-tabulation 5.12: Waiting time and Satisfaction from EMTS service

<i>Waiting time for the service</i>	<i>Satisfied from EMTS service</i>		Total
	Not satisfied	Satisfied	
Less than half hour	3.3 %	18.3 %	21.6 %
Half hour	16.7 %	41.7 %	58.4 %
More than half hour	13.3 %	6.7 %	20 %
Total	33.3 %	66.7%	100 %

Field Survey, 2015

n=60

Cross tabulation 5.12: reveals that the waiting time has a significant effect to the satisfaction of the users of the EMTS Service. 41.7% users are satisfied they wait only half an hour for the service. Whereas 18.3% are satisfied they wait less than half an hour, 6.7% are satisfied they wait more than half an hour. So, the variation of the satisfaction is significant. So, less waiting for the EMTS service has positive effect on the performance of the service.

Easy accessibility of EMTS service:

Case- 1:

Case-1: Person Very Satisfied with the EMTS Service

Mist. 'Shanta Ibrahim'*,

Resident of Rokaiya Hall.

Home district: Khulna.

Profession–Student of D.U

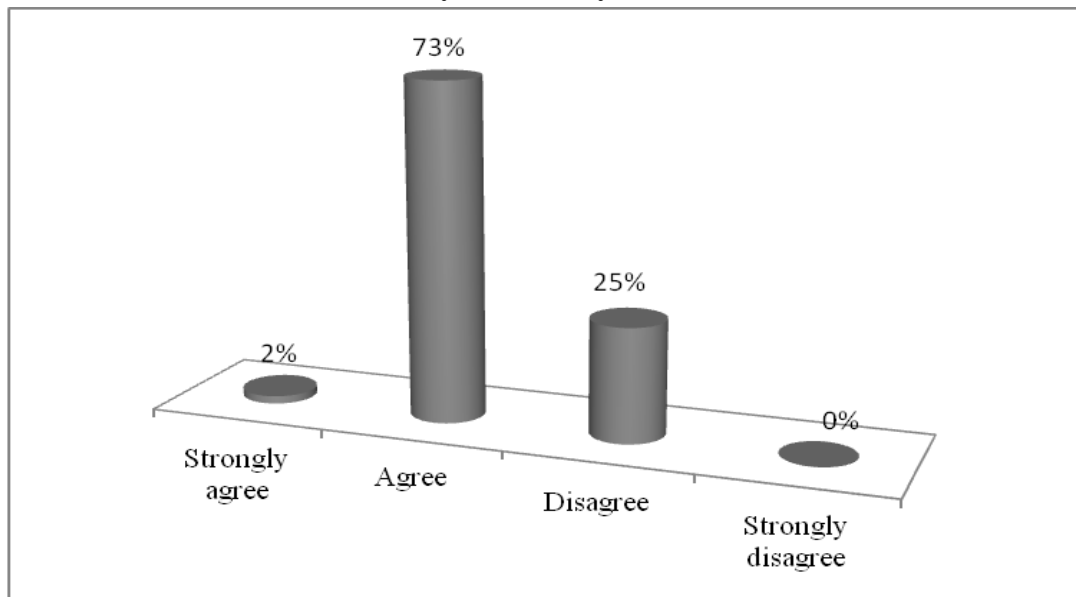
I am 22 years old after passing H.S.C from Khulna Government College I got admitted myself in the University of Dhaka, under the department of Political science. Now I am a 4th year student. I am the eldest daughter of my parents. My family is staying in Khulna. And my parents always think for me. My father is a businessman. And every month my father comes in Dhaka for business purpose and he physically visits me and that time gave my monthly cost. In my 4th year University life, it is the first time that my father couldn't visit me in last month due to my family reason, On the other hand my 4th year final exam is in the next month so it is urgent need to do form fill up for the Exam, but I have not enough money for that. So, I need money for monthly cost and extra money for form fill up. And my father couldn't come in Dhaka. At that time, one of my relative told my father about the Postal money transfer system (EMTS). My father immediately went to post office and has sent 8000 (eight thousand) taka to me from Khulna GPO by EMTS as my cost, within 10 minutes I got my desired money from Dhaka University post office. This Post office is very close to me, and EMTS system is easy. It has saves my time, its service charge is lower than private operator. It is secured and quick service of

Bangladesh post office. I am happy and satisfied with the service. And I am also hopeful about this digital service of Bangladesh post office.

* Pseudo names have been used to hide the identity of the respondent

5.9 Easy accessibility of EMTS service

Chart 5.5: Easy accessibility of EMTS service



Q. Do you think the EMTS facilities are easily accessible? (n=60)

The service recipients were researcher asked by researcher regarding easy accessibility of EMTS. In replying the question, if strongly agree and agree merged then 75% users were Agreed that EMTS facilities are easily accessible (see: chart 5.5). And In depth interview service providers were also agreed about the easy accessibility of EMTS service.

Cross tabulation 5.13: easily accessible and Satisfaction from EMTS service

<i>EMTS facilities are easily accessible</i>	<i>Satisfied from EMTS service</i>			
	Level	Not satisfied	Satisfied	Total
	Strongly agree	0%	1.7 %	11.7 %
	Agree	11.6%	61.7%	73.3 %
	Disagree	21.7 %	3.3%	25%
	Strongly Disagree	0%	0%	0%
	Total	33.3 %	66.7%	100 %

Chi-square value is 25.711 and critical p-value is 0.000

Cross tabulation reveals that the easy accessibility has a significant effect to the satisfaction of the users of the EMTS Service For the ease of analysis, if strongly agree and agree are merged, and then it shows that (63.4%) users are satisfied when users are

agreed that EMTS is easily accessible and the variation of the satisfaction is significant. (See table 5.13)

In Chi-square test it is found that there is significant relation between easy accessibility and satisfaction of the EMTS users. As EMTS is easily accessible users are satisfied with it. So, Easy accessibility of the EMTS service positively influences the performance of the service.

H 1= Easy accessibility of the EMTS service may positively influence the performance of the service- result hold true. (See Chi-square value table 6.6 in annexure 6)

5.10 Attitude of service provider

An attitude of service providers was defined as the way to understand the interface between the service providers and the users. In other words, how have service providers responded towards the service users with the provision of EMTS service by the post office. Thus, the attitude of providers is understood either as positive or negative meant that indifferent, friendly and rude attitude towards the service users.

Case - 2

Person not satisfied with attitude of the service provider

Case-2

Mr. Saiful islam

Profession: Sub inspector of Bangladesh Police. Posting place-Moulvibazar district.

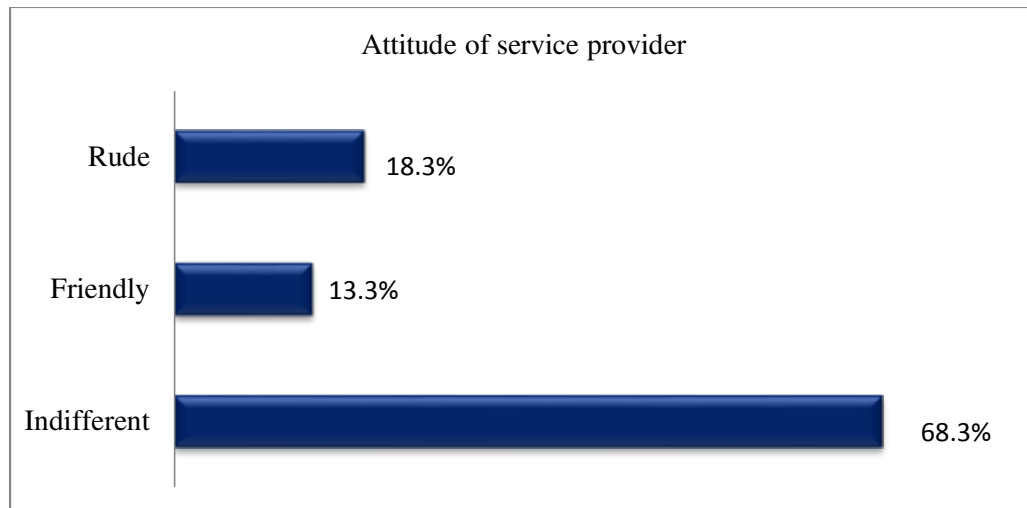
His family is staying in Faridpur district at Bhanga upizila. Most of the time he use to sent money to his family through Bkash or bank account. Few days back he knew about Bangladesh post office EMTS facility from his relative. Due to high security and low cost he came to Moulvibazar head post office and sent 20000 taka as a monthly cost to his family. In receiver address he wrote his son name and mobile number who is 16 years old. He sent money at 10.00 AM from Moulvibazar head post office at 2:00 PM senders son (receiver) went to Bhanga Upazila Post office and claim for money by showing 16 digits pin code. At first EMTS operator told him comes tomorrow today payment hour is over. Receiver insists on the operator to give his payment. Then operator told receiver show your National Identity card then I shall give your claimed money. But 16 years old boy is not eligible for National Identity card. Receiver informed the situation to the sender. Then sender talked with that post master by disclosing his identity and finally that day at 5:00 PM receiver got his money in his hand. The sender is so annoyed with the attitude of the service provider and wrote an application with detail and gave it to the Moulvibazar head post office to the post master from where he sent 20000 taka to his family. That time Researcher was present there. Sender was talking he had to suffer only

for lack of proper cooperative attitude of EMTS service provider. He is not satisfied at all with the attitude of service provider.

* Pseudo names have been used to hide the identity of the respondent

5.10.1 Response on “Attitude of Service Provider”

Chart 5.6: Attitude of service Provider



Q. What kind of treatment have you got from the EMTS service provider? (n=60)

Service users were asked to provide their opinion on the attitude of service providers. The majority of the respondents (68%) said they got indifferent attitude from the EMTS service providers 18.3% said rude attitude however 13.3% said they got friendly attitude from the EMTS service providers (see chart 5.6).

To cross check the responses of service receivers, Service providers were asked the Question (Q, Do you support the EMTS policy? In replying the question respondents told on Saturday only EMTS operator has to do work for the service without incentive and operators are treating the EMTS service as an extra work load. That's why they did not liking the system. And service implementer told operators are not cooperative always to users, because of some institutional limitations such as proper incentive and motivation.

5.10.2 Attitude of Service Providers and Satisfied from EMTS service

Now the important question arises, has the attitude of service provider associated with the performance of EMTS as such? To get the answer, users are satisfied or not satisfied with Attitude of Service Providers. Cross tabulation chi-square test and hypothesis test has been done.

Cross table 5.14: Attitude of the service provider and from EMTS service

<i>Attitude of the service provider</i>	<i>Satisfied from EMTS service</i>			
	Level of attitude	Not satisfied	Satisfied	Total
	Indifferent	25.0 %	43.3%	68.3 %
	Friendly	0%	13.3%	13.3 %
	Rude	8.3%	10.0%	18.3 %
Total		33.3 %	66.6 %	100 %

Chi-square value is 4.922 and critical p-value is 0.045

Cross tabulation 5.14: in above, shows that attitude of service provider has a significant effect to the satisfaction of the user's of the EMTS Service. 43.3% users are satisfied when they got indifferent attitude from the service provider. Whereas 13.3% users are satisfied when they got friendly attitude and 10.0% users are satisfied when they got rude attitude. So, the variation of the satisfaction is significant.

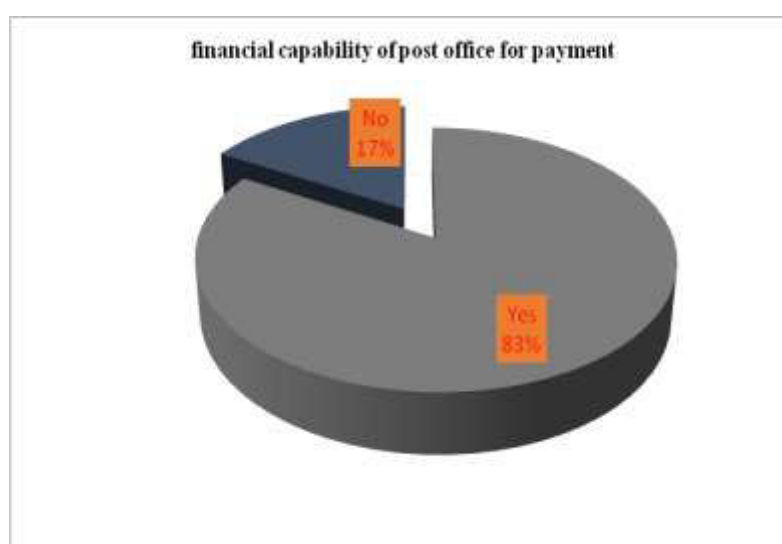
The Chi –square test value reveals that the relation is significant between the attitude of service provider and satisfaction of the EMTS users (see Chi-square test table 6.7 in annexure 6). And it is found that the significant number of the users, that is (43.3%) users were satisfied even in indifferent attitude of EMTS service providers. It can be said that “attitude” was indifferent; though it is indifferent but accessible as majority users were satisfied with it. So it has ‘positive’ meaning. It may many reasons for user's satisfaction may be faith in government institution during survey 73% users said that they feel secured as it is a Government service. So, indifferent attitude of the service providers has positive effect to the performance of EMTS. If users got cooperative or Positive attitude from the of service provider the performance of EMTS service would much better.

H2= Positive attitude of service provider may ensures the performance of EMTS service-
- holds true.

5.11 Financial Capability of post office for payment

To know the Financial Capability of post office for payment the question was asked users

Chart 5.7: Financial Capability of post office for payment



Q. Is post office financially capable to give your payment? (n=60)

The majority of the users (83.3%) perceive post offices are financially capable to deliver EMTS payment. Only few users (17) % had different experience of having easy cash delivery from post office (chart 5.7). But in comments portion respondents pointed out the “financial incapability” of the “Sub-Post Offices and Branch Post Offices” rather than head post offices.

To cross check the users, in depth interview the Question was asked (Q. Do you have sufficient amount of money in post office for more or big transaction of EMTS?) Both respondents said most of the time they have sufficient money as it is HPO for give payment but problem is in Sub and Branch post offices; shortage of money they cannot give payment in time as their authorize balance is 500 taka only.

Director General told for some security reason and lack of same institutional setup in all post offices, authority is not providing more cash money as a reserve fund. But they will take their required money from HPO by written demand and it also takes some times.

5.11.1 Financial Capacity of post office for payment and Satisfied from EMTS

Now the important question arises, has the Financial Capacity of post office for payment associated with the performance of EMTS? To get the answer, users are satisfied or not satisfied with Financial Capacity of post office. Cross tabulation chi-square test and hypothesis test has been done.

But there are different situations when Sub-Post Offices or Branch Post Offices is located adjacent to Head Post Offices. For instance, Dhaka University post office is a Sub-Post Office but this post office is capable for EMTS payment and users got sufficient money for withdraws. This is because whenever there were cash shortages, the Post Master managed to collect cash instantly from the Dhaka GPO as it is very close to DU sub post office. As users completed their transaction and they are satisfied with the EMTS service which has positive effect to the performance of EMTS service.

Cross table 5.15: Financial Capacity of post office and satisfaction

<i>Financial Capacity of post office for payment</i>	<i>Satisfied from EMTS service</i>			
		Not satisfied	Satisfied	Total
	Yes	20 %	63.3 %	83.3 %
	No	13.3 %	3.4 %	16.7%
	Total	33.3 %	66.6 %	100 %

Chi-square value is 11.760 and critical p-value is 0.001

Cross table 5.15 presented that the financial capacity of post office for payment has a significant effect to the satisfaction of the customers of the EMTS Service. It is found that 63.3% users are satisfied they said YES, and post office has financial capacity for payment and cross tab point out that the variation of the satisfaction is significant.

From Chi-Square Test it is found that there is significant relation between financial capacity of post office for payment and satisfaction of the EMTS users (see Table 6.8 in annexure 6). As users got sufficient amount of money in post office and they completed their transaction tasks. So, users are satisfied with EMTS. Financial capacity of post office for payment positively affected to the satisfaction of the user's.

H 3= Higher the financial capacity of post office for payment may positively influence the performance of the EMTS service-holds true.

CASE: 3

CASE: 3 <u>Person with extreme dissatisfaction from EMTS Service</u>
Md. Jahir Rahain*. Age: 32 years, working place: Tangail district (family planning officer). Home District: Lakshmipur
My family is staying in Lakshmipur District, Sadar upazila. I am the eldest son of my parents and I am the only one earning member of my family. My father is expired. I have two college going brothers. Last night my mother got admitted in Lakshmipur sadar hospital for high fever. Now she is hospitalized. It is urgent need to send money to my family. My brother told me about postal EMTS service. So I came in Tangail post office and have sent 10000 taka (Ten thousand taka) to my family. I sent money from Tangail head post office at 9:30 am. Now it is at 2:30 my family couldn't withdraw the money from Chandraganj Sub post office in Lakshmipur sadar upazila. Because there is not enough money in sub post office for the EMTS payment. Post master has sent a demand by messenger to Lakshmipur Head post office if money comes to day then my family can withdraw the money. After hearing this, my brother went to Lakshmipur Head post office which is 15 kilometer far from my residence. At 4:30 from head post office my brother withdraws the claimed money. So I think postal EMTS system is time consuming it has wasted my emergency time and it is not hassle free. I do not like its long pin code and form fill up system. Post office has started the service without keeping sufficient money in post office for payment. If I sent it through private operator it would be more hassle free than post office. I am highly dissatisfied with the postal EMTS service.
* Pseudo names have been used to hide the identity of the respondent

5.12 Completion of EMTS transaction task with in a service hour

A large number of the respondents (88%) acknowledged that Post Offices were able to complete their transaction activities within the service hour (See Table 5.16). Some of the other respondents faced difficulties to complete their transaction within the expected time. This has happened due to not for the lack of discipline or sincerity of the service providers but for the shortage of available liquid money in post office.

Table 5.16: Completion of EMTS transaction task with in a service hour

	Frequency	Percent
Yes	53	88.3
No	7	11.7
Total	60	100.0

Did you manage to complete your transaction task with in a service hour? (n=60)

In depth interview of service providers Question was asked (Q, 7. Are you able to provide the service in time? If no please mention the reason). Both respondents told most of the time they can provide the service in time, but sometimes it is not possible only for shortage of money in post office. One of the respondent experienced of incapability of EMTS of sub post office transaction completion within service hour. The reason is mostly related to the lack of sufficient cash in the post office. The respondent said,

‘I live in upazila level. I could not draw money because there are frequent crises for cash money in Sub Post Office and Branch Post Office. I had to visit the Post Office twice, sometimes in the other day.’

This person has to visit in sub Post Office to avail the service for two days which is definitely a limitation of the financial system of sub post office.

5.13 User’s awareness about the service (Source of information about EMTS)

Almost all of the respondents (98%) came to know about the EMTS service from their relatives and neighbors (see: Table 5.17). In depth interview of service provider said EMTS service is not well known to the society. Top Service implementer Director General said

“Very few numbers of peoples are aware about the EMTS service. At the very beginning of the service there was limited advertisement in mass media for public awareness but in course of time it is invisible because of proper guidelines and monitoring system”.

Table 5.17: Source of information about EMTS

Source of information about EMTS	Frequency	Percent
Newspaper	1	1.7
From Relatives or neighbor	59	98.3
Total	60	100.0

Q. How did you come to know about EMTS service? (n=60)

5.14 Publicity for EMTS by Post Office

All respondents said (100%) they did not see any publicity by the post office for the service. (See table 5.18). In depth interview the Question was asked (Q. Do you have any publicity system to increase public awareness about the EMTS service?) both respondents said they have not any publicity system to increase public awareness.

In response to the publicity question Top implementer said

“Authority has a plan for advertisement about the EMTS service in mass media such as television, and newspapers”.

He expressed his envision by saying,

“Now we are trying to reintroducing advertisement system through mass media and also going to increase our outlet by new recruiting”.

Table 5.18: Publicity for EMTS by Post Office

	Frequency	Percent
Yes	0	0
No	60	100.0
Total	60	100.0

Q. Have you seen any publicity by post office to increase public awareness? n=60

In field survey 100% respondent said that they have not seen any publicity for the service. (See table 5.18).

On the other hand one of the respondents think that it is a contemporary need to advertise the EMTS service in media as there are many competitors in the market to provide mobile financial transfer services. The advertisement will help people to know about the availability and accessibility of the services including the cost and quality which might help to grow the services. He also said,

“I think post office service implementer should give more advertisement through media about the EMTS service. I did not hear any information about the EMTS service from the post office side I have heard about EMTS service from my relative who works in post office”.

Another respondent said that

“I think awareness is most important thing that should be focused by EMTS authority to satisfy users. This will create a good image on EMTS”

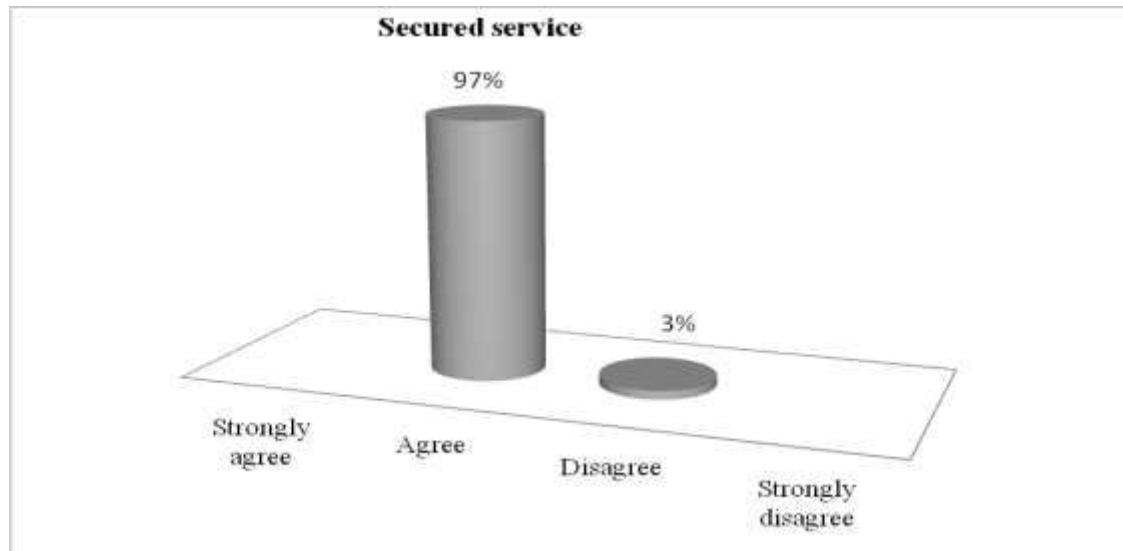
5.15 Security of EMTS

Almost all of the respondents (97%) believe that EMTS is a secured service (See Chart 5.8). As one respondent express his feeling about the security of EMTS that

“EMTS has a high security; I trust it and have an opportunity to use it”.

In depth interview the Question was asked (Q, Do you feel the system is secured? Please mention how?) In replying the question, respondents said positive about the security of EMTS service. And security is ensured by 16 digits pin code.

Chart 5.8: Security of EMTS



Q. Do you feel the EMTS system is secure?

(n=60)

5.15.1 Security of EMTS and Satisfaction from EMTS service

Now the important question arises, has Security of EMTS associated with the performance of EMTS? To get the answer, users are satisfied or not satisfied with Security of EMTS. Cross tabulation chi-square test and hypothesis test has been done.

Cross table 5.19: Security of EMTS and Satisfaction from EMTS

<i>Security of EMTS</i>	<i>Satisfied from EMTS service</i>			
	Category	Not satisfied	Satisfied	Total
	Agree	30.0 %	66.7 %	96.7 %
	Disagree	3.3%	0%	3.3 %
	Total	33.3%	66.7 %	100 %

Chi-square value is 4.138 and critical p-value is 0.042

Cross table 5.19: reveals that the security has a significant effect to the satisfaction of the customers of the EMTS Service. 66.7% users are satisfied when they agreed that EMTS is

secured service. No responded is found in favor of disagree with the security matter but satisfied with the service and the variation of the satisfaction is significant.

In chi-square test it is found that the relation between security and satisfaction of the EMTS users is significant. As EMTS is highly secured service so, users are satisfied with the service. (See table: 6.9 for chi-square value in annexure 6).

H4= High security of the EMTS service may positively influences the performance of the EMTS –result is positive.

5.16 EMTS service is a quick service

Quick service delivery is one of the factors to use any service it also influence the users behavior intention to further use any service. From present study it is found that 70% respondents agreed that EMTS service is a quick service (see: table 5.20) in below.

Table 5.20: EMTS service is a quick service

Satisfaction level	Frequency	Percent
Strongly agree	0	0
Agree	42	70
Disagree	18	30
Strongly disagree	0	0
Total	60	100

Q. Do you think the EMTS is a quick servic n=60

Quick service As one of the respondent said that

“EMTS is easy, convenient and faster process for money transfer and withdraws”.

To cross check the respondents during in depth interview the same question was asked to the service providers. Respondents told EMTS service is faster, than the earlier period paper base money order System. Before EMTS it took 5 to 7 days now user can withdraw money within 10 minutes by EMTS service.

Respondent has different feeling about the service period the EMTS provide. Some of them think that the service has some limitations which impact on the swift service such as service provider’s attitude to response customer’s demand and queries, low market based approach to the users, availability of sufficient cash in the post office, lack of competition with the other service providers.

5.16.1 EMTS service is a quick service delivery and Satisfied from EMTS

So, now it is the important to know the answer, has quick service of EMTS associated with the performance of EMTS? To get the answer, users are satisfied or not satisfied with quick service delivery of EMTS. Cross tabulation chi-square test and hypothesis test has been done.

Cross table 5.21: Quick service and Satisfied from EMTS service

<i>EMTS service is a quick service</i>	<i>Satisfied from EMTS service</i>			
	Category	Not satisfied	Satisfied	Total
	Agree	8.3 %	65 %	73.3 %
	Disagree	25 %	1.7 %	26.7 %
	Total	33.3 %	66.7 %	100%

Chi-square value is 35.83 and critical p-value is 0.000.

Cross table 5.21 presents that the quick service has a significant effect to the satisfaction of the users of the EMTS Service. It is found that 65% users are satisfied; when they agreed that EMTS service is a quick service. 1.7 % user are satisfied when they disagreed that EMTS is quick service. So, the variation of the satisfaction is significant.

Chi-square value is significant and there is significant relation between quick service and satisfaction of the EMTS users. (See table: 6.10 for chi-square value in annexure 6). As EMTS is quick service so, Majority users are satisfied with the service.

H5= Quick service delivery may positively influences the performance of the EMTS service- result hold true.

5.17 Conclusion

Collected primary data from field survey, interview and related Cases are included here. The findings of the questionnaire survey by means of SPSS tool and manually organized the qualitative findings. In this part the analysis of individual variables by parameters were explained and their significances had been scrutinized. The table 5.22 in below presents the list of hypotheses which found that there was a significant relation between individual hypothesis and satisfaction of the EMTS users. The chapter has analyzed the Performance of EMTS in terms of user's satisfaction with the service. The Performance of EMTS was observed as respondents agreed that EMTS meets their expectations and they are satisfied with the service. These findings provide evidence to support that the EMTS users consider that EMTS is easily accessible, quick service, secured service and

financially capability of head post offices and DU sub post offices for payment; these factors were positively influences the performance of EMTS service.

Further, financial capability of all post offices, and EMTS service providing system and their effects to the EMTS user's were discussed to find the association of EMTS performance with the perceived ease of use and perceived usefulness of Technology Acceptance Model (TAM), if any.

The survey revealed that all the components of perceived ease of use and perceived usefulness of Technology Acceptance Model (TAM) associated to performance of EMTS, it is found that Majority Users got indifferent attitude from the EMTS service providers, sub and branch post offices were not financially capable to give EMTS payment and for public awareness there was no publicity system. So, these institutional limitations have some effect to the satisfaction of the user's and the performance of EMTS service.

Table 5.22: Test of Hypothesis at a glance:

Null Hypothesis	Chi-square	p-value	Decision	Remarks
There is no relation between easy accessibility and satisfaction	25.711	0.000	rejected	There is significant relation
There is no relation between the financial capacity of post office for payment and satisfaction	11.760	0.001	rejected	There is significant relation
There is no relation between quick service and satisfaction	35.83	0.000	rejected	There is significant relation
There is no relation between attitude of service provider and satisfaction	4.9	0.045	rejected	There is significant relation
There is no relation between security and satisfaction	4.138	0.042	rejected	There is significant relation

With these findings, it can be said that performance of EMTS service is found to be influenced by user's satisfaction. Users were satisfied as EMTS were easily accessible, quick service, secured service and financial capability of head post offices and DU sub post office for payment and even with indifferent attitude of service providers.

Users would be more satisfied if all post offices are financially capable to give payment and users got cooperative attitude from the service providers and post office introduced the publicity for user's awareness. Then the performance of EMTS service would be much better.

Chapter Six: Discussion and Summary

6.1 Discussion

From this study it is revealed that EMTS facilities of Bangladesh post office is easily accessible to all classes of people anyone can avail the service from 2,750 post offices (out of 9,886) across the country. From early days people are using postal service for money transfer which was paper base Money Order. But in course of time this system has become absolute. For the potent demand of the user's to quick transfer of money at desired locations, Bangladesh Post launched a new money order service as EMTS in the year 2010. As people were used to transfer money through post office, so users were aware about the update Electronic money transfer service (EMTS). And Majority of the users said that EMTS is easily accessible. This indicates that users feel comfort to avail the EMTS service. The study also reveals that majority users are less distance areas people that are in 0-5 kilometers and they did not spent at all as transport cost for the service and majority users also completed their transaction within half an hour. Triangulation with the qualitative data it is found that EMTS users are close distance areas people and EMTS is easily accessible. It is assumed that when people avail the service from close proximity, they can save transport cost. This could be a reason for satisfaction to the EMTS services. In addition, when people avail the service from close to their house they can visit Post Office frequently if there is any wrong payment or delayed. So, Easy accessibility of EMTS is the strong predator of user's satisfaction.

People from diverse socio-economic and demographic background of three study area use the EMTS services although study area and age, gender, education level and occupation does not necessarily influence significantly on the performance of EMTS service.

Financial Capacity of post office for payment has a significant effect to the satisfaction of the user's of the EMTS Service and in this study Moulvibazar head post office, Tangail head post office and DU sub post office were financial Capable to give payment of the user's. As majority of the users were satisfied with the EMTS transaction from these Post Offices. The study reveals that the Sub-Post Offices or Branch Post Offices are located adjacent to Head Post Offices they are Financially Capable for payment. For instance, Dhaka University post office is a Sub-Post Office but this post office is capable for EMTS payment and users got sufficient money for withdraws. This is because whenever

there were cash shortages, the Post Master managed to collect cash instantly from the Dhaka GPO as it is very close to DU sub post office.

But in comments portion respondents pointed out the “financial incapability” of the “Sub-Post Offices and Branch Post Offices” rather than head post offices, and service providers have pointed out that Sub-Post Office and Branch Post Offices suffer from acute cash shortage as their authorized balance is only 500 taka and as a result these post offices are not financially capable in delivering EMTS payment on time. It means that post office authority, are not well aware about the financial incapability of Sub-Post and Branch Post Offices. For acute cash shortage these Post Offices are not performing efficiently. So it is significant giving rise to financial capability of the “Sub-Post Office and Branch Post Offices” for payment.

But present study reveals that Moulvibazar head post office, Tangail head post office and DU sub post office were financially capable to give payment of the user's. As majority of the users were satisfied with the EMTS transaction from these Post Offices. Triangulation with the qualitative data it is found that head post offices were financially capable to give payment as their authorized balance is much higher, and DU sub post office is close to Dhaka GPO. Post Master managed to collect cash instantly from the Dhaka GPO. So, Financial Capability of these post offices for give payment, positively effect to the satisfaction of the user's and performance of the EMTS Service.

Indifferent attitude of the service providers also has positive effect to the performance of EMTS. It is found that majority users (43.3%) are satisfied even in indifferent attitude of EMTS service providers. So it has positive meaning and positive effect on EMTS service. As majority users were satisfied with the attitude of service providers. It may many reasons for user's satisfaction may be faith in government institution as 73% respondents said they feel secured as it is a Government service, and may be for easy accessibility and others. Triangulation with the qualitative data it is found that service providers do not like EMTS policy they are working in Saturday without incentive, which is weekend of government employees. Certainly, only for this reason service providers are showing indifferent attitude to the Users. So, it can be say that If users got cooperative or Positive attitude from the of service provider the satisfaction of the users and performance of EMTS service would be much better.

User's awareness about the service is influence the behavioral intention of the user's to use the service. From this study it is found that (98%) users came to know about the EMTS service from their relatives and neighbors. Triangulation with the qualitative data it is found that service providers said users were not well aware about the EMTS service, and there was no publicity system for public awareness. Developing awareness about the service in users is significant factor to adopt EMTS service. As EMTS is new thing for the users, hence less information and less awareness prohibit users to adopt EMTS. So, no user's awareness or no publicity of EMTS service has negative impact on the performance of EMTS service. It has been proven that more the awareness of EMTS service lead to more use of EMTS. Awareness about the services has direct impact on increased usage of EMTS. Users should clearly know about the services provided by Bangladesh post office that what are they and how they can be used. If users are well aware of the information about services, advantage of the service and method of using the service than user will more willing to use EMTS. It can be say that deficient awareness of EMTS is main hindrance of understanding about advantages of the service. So, no user's awareness or no publicity of EMTS service has some negative impact on the performance of EMTS service.

The security has direct and positive relationship with User's satisfaction. More secure cause more satisfied. In field survey (97%) respondent said that EMTS is a secured service. Triangulation with the qualitative data it is found that Service providers said EMTS is highly secured service; security is ensured by 16 digits pin code. As EMTS is highly secured service users are more satisfied with the service. So, Security is an important factor for positive performance of EMTS

Quick service delivery is an important factor for positive performance. During survey 70% respondents agreed that EMTS service is a quick service and triangulation with the qualitative data it is found the same answer as service providers said affirmative in this regard. Users are satisfied with the EMTS for its quick service delivery. So, quick service delivery positively influences the performance of the EMTS.

However, by analyzing the data with various means it is found that 66% users agreed that EMTS met their expectation and they are satisfied with the EMTS service and EMTS

service has the highest influence to the user's satisfaction and which has positive effect on the performance of EMTS service.

Major findings:

The present study also find out some institutional limitations like; “no advertising system or no public awareness system about the EMTS service,” “financial incapability of sub and branch post offices for payment,” and “indifferent attitude of EMTS service providers” these independent variables have some negative effect to the satisfaction of the user's and performance of EMTS service. Some users also expressed their dissatisfaction on EMTS. As secondary data reveals that after 2012-2013, users of EMTS decreased 31% to 10% and 10% to 4% till 2015 June and revenue income of post office also decreased a lot. which may happened due to long waiting time for service delivery in sub and branch post offices, incapability of sub and branch post offices for payment, indifference attitude of the service providers; from in depth interview it is found that service providers showing indifference attitude lack of proper incentives. And service provider said, the Present condition of EMTS is not good at all' on average they perform 3 or 4 EMTS daily.

6.2 General Findings

The study has examined the extent to which the performance of EMTS service was influenced by user's satisfactions. From the study it is found that Majority users were satisfied with EMTS service; as EMTS is easy to use and useful to them. And they said that EMTS has able to meet their satisfaction. The study also revealed all the components of perceived ease of use and perceived usefulness of Technology Acceptance Model (TAM) are associated to the performance of EMTS service. From the testing of hypothesis it is identified that all the hypothesis are accepted which shows that the all the variables identified in the research have a significant positive relationship with users satisfaction towards the EMTS. So; the present performance of EMTS service was influenced by user's satisfaction

6.3 Factors Causing Satisfaction of the users:

Satisfaction of the users has been derived under the entire variables of the study. Majority users were satisfied with EMTS service as EMTS is easily accessible; users were satisfied as there was no transport cost and less waiting time for the service. Financial capacity of

Moulvibazar HPO, Tangail HPO and DU sub-post offices for give payment, secured service and quick service delivery influences the user's satisfaction, users feel more satisfaction from the EMTS. Majority users were also satisfied with the attitude of service providers. So, it can be say that, the performance of EMTS service was influenced by it's users satisfaction. Five hypotheses were tested during the study. First hypothesis was Easy accessibility, second was related with Positive attitude of service provider. Third was related with Higher the financial capacity of post office for payment. Fourth was related with High security of the EMTS service and finally five was related with Quick service delivery. Study supported the entire hypotheses.

The results indicate that users are expecting if post offices introduce advertising system for public awareness, if all post offices are financially capable to give payment and users get cooperative attitude from the service providers, then user's satisfaction with the EMTS would be much higher and performance of EMTS would be much better.

During in-depth interview the top implementer said "The Government going to reintroducing advertisement through mass media and also going to introduce the service in 2,500 post offices from January next after ensuring necessary training for its officials and will reduce the EMTS service charge as from Tk. 27 into Tk.15 for Tk. 1,000, which is the lowest-ever rate in the EMTS service sector". This information also indicates the future better performance of EMTS service.

6.4 Summary

This section summarizes the whole study. In today's world, optimum use of ICT is vital for a country's socio-economic development. In Bangladesh, the government has recognized the importance of ICT for making the service delivery prompt and effective way and thus has introduced various ICT based service in different public offices. With the touch of ICT there have been rapid modernizations in Bangladesh Post. To develop ICT based digital, quick and secured Money Transfer, Bangladesh post has taken a range of initiatives in the last five years, in 2010 Bangladesh post has introduced this EMTS service. The traditional paper based money order system has gone through various changes due to the introduction of Information Communication and Technology (ICT) base EMTS service. EMTS service is running by Bangladesh post office, so it is important to examine the real scenario of EMTS service, the study attempted to address the crucial question: what is the present condition of EMTS service and what factors are responsible for EMTS

performance. The study, thus, was devoted to understand the factors influencing performance of EMTS service. In other words, the main objective of the study was to evaluate the performance of EMTS.

Performance of EMTS was understood in terms of user's satisfaction with the service and was measured with the two factor of TAM theory perceived ease of use and perceived usefulness.

The dependent variable was performance of EMTS indicator is satisfaction of the users.

The independent variables were:

Perceived Ease of Use

- Accessibility - (Distance, Time, and Cost)
- Attitudes of service provider
- Financial capacity of post office for payment

Perceived Usefulness

- Quick service
- Secured
- User knowledge/Awareness

The underlying assumption of the study was that user's factors influence the performance of EMTS. Theory of Technology Acceptance Model (TAM) by Davis (1989) was used to support the assumption. The study, thus, tried to understand the performance of EMTS on the user's satisfaction view point, Meaning is user's are satisfy with EMTS, is EMTS able to meet its user's requirements and expectations. How EMTS service providers are delivering EMTS service to its users. How useful EMTS is to its users, are these factors influencing the performance of EMTS service. Study areas are Dhaka University sub post office, Tangail head post office and Moulvibazar head post office. The study was basically descriptive cum analytical research study, and had used a combination of content analysis, survey through in-depth interview and questionnaire and case study to collect data. Interview was carried out to three EMTS service implementers and 60 respondents were questionnaire surveyed and 03 case study. Findings from the primary and secondary data were presented and analyzed using different statistical and mathematical tools like chi square, tabulation, percentage and frequency.

RESEARCH QUESTIONS

Q. what is the present condition of EMTS service?

From secondary data it is found that when EMTS was launched in 2010 and onward the transaction under this service was round taka 40,000 in totals daily. And it was the main revenue income source of Bangladesh post office at 2011-2012 but after 2012-2013, users of EMTS decreased 31% to 10% and 10% to 4% till 2015 June which happens due to long waiting time for service delivery in sub and branch post offices, incapability of sub and branch post offices for payment, indifference attitude of the service providers, may be dissatisfaction has arose in the user's. Some users also expressed their dissatisfactions and they are switching to other private operators; Besides EMTS, in Bangladesh currently several private money transfer services are providing the same service such as DBBL, bKash or uCash although the cost, service providing system and security are varies from one to another. This may be a reason for decreasing the performance of EMTS. Triangulation with the qualitative data in-depth interview service provider said, the Present condition of EMTS is "not good at all" on average they perform 3 or 4 EMTS daily. Top service implementer said due to the indifferent attitude of some officials, and also for some institutional limitations some customers have lost their faith in postal EMTS service.

Q.2. what factors are responsible for the performance of EMTS?

The findings from the data analysis can be summarized as follows:

The results contribute to the existing literature in several ways. The study area and Socio Economic and demographic background of the users had not any effect to the performance of EMTS service.

- a. Firstly, Close distance, less service receiving time and low transport cost for the EMTS service significantly influences to the user's satisfaction and (73%) user's was agreed that EMTS is easily accessible. Related to easily accessibility there was a case and it is found that the Person was Very satisfied with the EMTS Service as it is useful and easy to use. This finding supports the hypothesis that Easy accessibility of the EMTS service may positively influence the performance of the service. So; Ease accessibility of EMTS service is the first important factor for positive performance of EMTS.

- b. Secondly, financial capability of post office for gives EMTS payment. (83.3%) users said that post offices are financially capable to give EMTS payment. as head post offices authorize balance is high so users got there sufficient amount of money for their transaction and DU sub post office is close to Dhaka GPO if there is crisis for money post master collect it instantly from Dhaka GPO. As users got sufficient amount of money in all the post offices and they completed their transaction tasks, users are satisfied with EMTS. **H 3=** Higher the financial capacity of post office for payment may positively influence the performance of the EMTS service- result is true. So, Financial capacity of post office for payment is a second important factor for positive performance of EMTS
- c. Indifferent attitude of the service providers also has positive effect to the performance of EMTS. It is found that majority users are satisfied even in indifferent attitude of EMTS service providers. It may many reasons for user's satisfaction may be faith in government institution as 73% respondents said they feel secured as it is a Government service, and may be for easy accessibility. So, it can be say that If users got cooperative or Positive attitude from the of service provider the satisfaction of the users and performance of EMTS service would be much better.
- d. Fourthly, User's awareness about the service is influence the behavioral intention of the user's to use the service. It was another factor for performance of the service, from this study it is found that (98%) users came to know about the EMTS service from their relatives and neighbors and users were not well aware about the EMTS service and there was no publicity system for public awareness so, no user's awareness or no publicity of EMTS service is negatively influence the performance of EMTS service.
- e. Fifth, Security (97%) respondent said that EMTS is a secured service. Service providers said EMTS is highly secured service; security is ensured by 16 digits pin code. As EMTS is highly secured service users are satisfied with the service. **H4=** High security of the EMTS service may positively influences the performance of the EMTS –result is positive. So, Security is a fourth important factor for positive performance of EMTS.

- f. Sixth, 70% respondents agreed that EMTS service is a quick service and service providers also said affirmative in this point. As EMTS is quick service so, users are satisfied with the service. **H5**=Quick service delivery may positively influences the performance of the EMTS service- result is positive. So, quick service is a fifth important factor for positive performance of EMTS.

In short, the study has analyzed the performance of EMTS in from the user's satisfaction view point. The performance of EMTS was observed as respondents agreed that EMTS has able to meet their expectation and they are satisfied with the service. The study also revealed all the components of perceived ease of use and perceived usefulness of Technology Acceptance Model (TAM) are associated to the performance of EMTS service. So, is found to that the performance of EMTS service was influenced by user's satisfaction. Majority users were satisfied with EMTS service; as EMTS is easy to use and useful to them.

Chapter Seven: Conclusions and Recommendations

7.1 Introduction

After summarizing the findings, this chapter given the conclusion, some recommendations are put forwarded for improving the performance of the EMTS service, some policy implications drawn based on the researcher's experiences and the collected data. It also indicates scopes of further research to analyze the impact of the EMTS service in a broader perspective.

7.2 Conclusions

The study has analyzed the performance of the EMTS service from the “user satisfaction” view point. The results contribute to the existing literature in several ways. The findings of the study conclude the following points:

Easy accessibility of EMTS, financial capacity of head post offices and DU sub post office for payment, quick service delivery and secured service of EMTS are positively influences the performance of the service as user's are satisfied with EMTS. By analyzing the data with various means it is found that, the performance of EMTS service is influenced by user satisfaction. Users are satisfied with the EMTS as it is easy to use and useful to them. From the testing of hypothesis; it is identified that the entire hypothesis are accepted. And all the variables have a significant positive relationship with users Satisfaction.

But this exploratory study has identified some important institutional limitations that factors are responsible for hindering the better performance of EMTS service. No advertising system about the EMTS service for users awareness, financial incapability of sub and branch post offices for payment, and indifferent attitude of EMTS service providers have negative effect to the user satisfaction and the performance of EMTS service; as Some users expressed their dissatisfactions and they are switching to other private operators; Besides EMTS, in Bangladesh currently several private money transfer services are providing the same service. This may be a reason for decreasing the present performance of EMTS.

From the field survey, it is found that users have faith on EMTS service, 73% respondents said they feel EMTS secured as it is a Govt. service (See table 5.25 in annexure: v). Service providers said only for security reason and for low transaction cost users are using EMTS service. Another respondent said

“For high security users come to post office for EMTS. If any misspent there is no recovery system in private operators. That’s why users prefer post office for EMTS”.

The findings of this research are useful to the EMTS policy implementers, so that they can take necessary initiative for the further improvement of EMTS service.

1. Authority can enhance the financial capability of all post offices for payment that will increase user’s behavior intention to use the EMTS service.
2. Authority can introduce the proper incentive system for the service providers on the basis of their performance. So that users get positive attitude from the service provider.
3. Authority can also introduce the publicity system for public awareness through mass media for the EMTS service.

The above measures would increase user’s satisfaction and performance of EMTS. The findings proved that all the components of perceived ease of use and perceived usefulness are associated to the performance of EMTS service.

If all post offices are financially capable to give payment, and service providers shows friendly attitude to the EMTS users; and users knows about the service then user’s satisfaction with the EMTS would be much higher.

Finally, the result was linked with the research hypothesis and objectives. It was found that the study rightly addressed the research questions and hypothesis.

In short, by analyzing data with various means it is found that the performance of EMTS influenced by user’s satisfaction.

7.3 Recommendations

The EMTS service needs to be improved:

To address the performance of EMTS service that is offered by Bangladesh post office. Some challenges are facing by users’ and service providers. So, both respondents are recommended for the following measures: During field survey, the researcher asked the service recipients regarding their Recommendations to improve the EMTS service. In replying the question among 60 respondents, 30%, said need more advertisement, 35 % said should establish more outlets, 15% said should keep adequate money supply in

branch/sub post office 20% said others. So, majority users Recommend for establish more outlets which is 35%. (See table 5.26 in annexure).

Service providers said

- i. Post office (PO) Need advertisement for the service
- ii. Should keep enough money in SPO and BPO for payment.
- iii. Should give incentive to the operators
- iv. PIN code should be short
- v. Need more manpower and out let

Top service implementer was asked how to overcome those challenges in replying the question he said,

“Our main strength is our net work. We have net work up to grass root level now we have planned to proper utilize it. We are going to increase our outlet with new recruitment, now EMTS is available at 2,750 out of 9,886 post offices across the country. The remaining post offices will deliver EMTS from the next month. The government will also introduce the service in 2,500 post offices from January next after training its officials,”

He also said that

“Government has cut the EMTS rate from Tk 27 to Tk 15 for Tk 1,000, and this rate is the lowest-ever in the service sector. Government will use Teletalk as well to support the service.”

The above mentioned information indicate that if all the initiative run in full suing the future performance of EMTS will be much higher than present study.

7.4. Policy Implications:

The researcher has identified some policy implications in the light with the recommendations came from the respondents as well as experiences gathered during the study. These implications can help the decision or policy makers to improve the EMTS service.

Policy Regarding Service Delivery System:

The government can make this EMTS service more accessible by increase authorize balance of all post offices for payment. And also can increase more outlets by post office itself or with the collaboration of other telecom companies for agents.

These initiatives will help the service seekers who use EMTS service, users will get outlet within a short distance areas. And if authorize balance is increase in every outlet users also can withdraw their desire money.

The authority should take initiatives for the publicity with advertisement through mass media for public awareness of the EMTS service so that mass people can be aware of the service and can take their desire service. In this regard, the government can involve the Bangladesh Television and others private channels for advertisement. This way the information of EMTS service can be circulated very fast and effectively.

Human Resource Management Policy:

To provide better quality services, the government should create more post with trained people who will deliver the EMTS service. The government should initiate trainings for the EMTS service provider regarding customs and manners of providing service to the service seekers. There should have a specific and mandatory code of conduct about how to deal with their clients and government also should provide more incentive for the service provider so that provider cannot show the indifferent attitude to the users and also should introduce the commission system for the service provider on basis of transaction. For the continuity of EMTS services, there should have a monitoring team in Director General Office that will monitor the activity of EMTS service units in all the Upazila offices.

7.5 Recommendation for further Studies

The areas which the study could not unfold might have some future implication for further research. They are:

1. This research is done in small area of Bangladesh post office. And research includes only service related factors for customer satisfaction. Further research

can be conducted with large sample size covering the major areas of Bangladesh.

2. It would be interesting if future researches are devoted to a comparative study of customer satisfaction with the private operators.
3. Further study can discuss the role of postal electronic money transfer service (EMTS) on economic growth of Bangladesh.
4. As this technology is still new to developing country like Bangladesh a study can also be conducted to assess the impact of electronic money transfer service (EMTS) on technological change of Bangladesh post office to the users in rural and urban areas.

References

Ahmed, S. M. S., Rayhan, S. J., Islam, M. A. and Mahjabin, S. (2011), "Problems and Prospects of Mobile Banking in Bangladesh", *Journal of Information Engineering and Applications*, 1(6), 43-62.

Aims and objective of EMTS: Director General Office; EMTS Section of Bangladesh post office collected 20.10.2015 Dhaka 1000,

Aminuzzaman, S. M.; (1991). *Introduction to Social Research*, Bangladesh Publishers, Dhaka.

Anthony, Dismas and Mutalemwa. K. ;(2014): Factors influencing the Use of Mobile Payments in Tanzania: Insights from Zantel's Z-pesa1 services. *The Journal of Language, Technology & Entrepreneurship in Africa (JOLTE)*, Vol. 5 no2. 2014.

Bangladesh Bureau of Statistics (BBS). (2010). Report on monitoring of employment survey 2009. Retrieved from <http://www.bbs.gov.bd/>.

Best, J. W. & Kahn, J. V., 2006. *Research in Education*. New Delhi: Prentice – Hall of India.

Boonlertvanich, K. (2011). Effect of customer perceived value on satisfaction and customer loyalty in banking service: the moderating effect of main-bank status. *International Journal of Business Research*, 11(6), 40-54.

Burns and Burch (1995); *Research design and Methodology* chapter-3.

Creswell, J. W. (2003). *Research Design: Qualitative, Quantitative, and Mixed method Approaches* (2nd Ed.) Thousand Oaks, California: Sage Publication,

Davis, F 1989, 'Perceived usefulness, perceived ease of use, and user acceptance of information technology', *MIS Quarterly*, Vol. 13, No. 3, pp. 319-340.

Davis, L. D., Bagozzi, R. P., & Warshaw, P. R. (1989). User acceptance of computer technology: A comparison of two theoretical models. *Management Science*, 35(8), 982–1003.

Dovi, E. 2008: 'Boosting Domestic Savings in Africa', Vol. 22, No. 3, [www.un. To invest more, countries must tap assets now outside the banks. http://www.un.org/africarenewal/fr/magazine/october-2008/renforcer-E2%80%99%C3%A9pargne-int%C3%A9rieure-en-afrique.](http://www.un.org/africarenewal/fr/magazine/october-2008/renforcer-E2%80%99%C3%A9pargne-int%C3%A9rieure-en-afrique)

Herzberg, A. (2003). Payments and banking with mobile personal devices. *Communications of the ACM*, 46(5), 53-58.

Websites:

EMTS service of Bangladesh post office. Available at: [http:// www.MOPTI.govt.bd](http://www.MOPTI.govt.bd) (accessed 01.03.2015).

Districts information Available at: (<http://www.districts of moulvibazar.govt.bd>. webpage accessed 27.06.2015).

Districts information Available at: (<http://www.districts of Tangail.govt.bd>. webpage accessed 27.06.2015)

Districts information Available at: (<http://www.districts of Dhaka.govt.bd>. webpage accessed 27.06.2015).

bkash mobile money transfer service Available at: <http://www.bkash.bd.com> (accessed 16.07.2015).

<http://www.hrmars.com/journals> (accessed 02.03.2015).

(<http://www.digitalmoneyforum.com/blog>(accessed 18.09.2015)

Mobile banking Available at: <http://www.thecitizen.co.tz> (accessed 15.02.2015).

<https://www.upsides.com/2015/03/31/access-mobile-banking-changes-lives-bangladesh/> (accessed 20.10.2015).

<http://siteresources.worldbank.org/INTPROSPECTS/Resources/334934-1110315015165/MigrationandDevelopmentBrief18.pdf> (accessed 18.06.2015)

http://www.statsdirect.com/help/parametric_methods/utt.htm accessed (accessed 13 .10, 2015).

<http://telenor.com/corporate-responsibility/initiatives-worldwide/easypaisa-banking-services-made-easy/>

http://www.lcgbangladesh.org/bdf-2010/BG_%2520Paper/BDF2010_Session%2520VI.pdf (accessed 20.08.2015)

[http // www.gsma.com/mobilefordevelopment](http://www.gsma.com/mobilefordevelopment)(accessed 21.10.2015).

<http://www.itu.int/.../T230100002000> (accessed 21.10.2015).

<http://dig.do/bangladeshpost.gov.bd> (accessed 20.10.2015)

http://www.gsmamobileeconomy.com/GSMA_Global_Mobile_Economy_Report_2015.pdf (accessed 25.10.2015) .

Digital money transfer service of Indian post Mobile banking Available at: http://www.indiapost.gov.in/money_r...(accessed 23.10.2015).

Bangladesh Post Office- Electronic money transfer service Available at: <http://www.Ministry of post, telecommunication and information technology.govt.bd> web page (accessed 29.01.2015).

Gatautis, Rimantas (2008). The Impact of ICT on Public and Private Sectors in Lithuania. *Economics* 4(59) The Economic Conditions Of Enterprise Functioning.

Hughes, N. and Lonie, S. (2007). M-PESA: Mobile money for the "unbanked" turning cellphones into 24-hour tellers in Kenya. *Innovations: Technology, Governance, Globalization*, 2 (1-2), 63-81.

Ishengoma.A.R;(2011): Analysis of mobile banking for financial inclusion in Tanzania: case of kibaha district council.

Islam, M. T. (2012). The effectiveness of the electronic money transfer systems of the Bangladesh Post Office. Unpublished Master's Thesis, International University of Japan, Niigata, Japan.

Jack, William, TavneetSuri, and Mit Sloan. "Mobile phones and mobile banking in kenya." The economicsOf M-PESA, August 2010.

Jamal, A., &Naser, K. (2002). Customer satisfaction and retail banking: an Assessment of Some of the Key Antecedents of Customer Satisfaction in Retail Banking. *International Journal o Bank Marketing*, 20(4), 146-160.

Jenkins, B. (2008). Developing Mobile Money Ecosystems. Washington DC. IFC and the Harvard Kennedy School.

Kofigah.k.s;(2010): mobile payments system the challenges to its adoption in Ghana and What Can Be Done To Make It Catch On?

Khattak,&Rehman (2010). Customer satisfaction and awareness of Islamic banking system in Pakistan. *African Journal of Business Management*. 4. (5), 662-67

Kothari C. R. (2004). Research Methodology: Methods and Techniques. New Delhi. Wiley Easter

Kumar, R., 2005. *Research Methodology: A Step – By – Step Guide for Beginners*. Delhi: Pearson Education

Lee, Y., Kozar, K.A., & Larsen, K.R.T. (2003). The Technology Acceptance Model: past, present, and future. *Communications of the Association for Information Systems*, 12, 752-780.

Lee, M. S. Y., McGoldrick, P. J., Keeling, K. A., & Doherty, J. (2003). Using ZMET to explore barriers to the adoption of 3G mobile banking services. *International Journal of Retail & Distribution Management*, 31(6), 340-348.

Mas,Ignacio, and AmoloNg'weno. (2010). Three Keys to M-PESA's success: Branding, channel management, and pricing. *Journal of Payments Strategy and Systems*, 4(4), 352-370.

Mbogo Marion,(2010): The Impact of Mobile Payments on the Success and Growth of Micro-Business: The Case of M-Pesa in Kenya. *TheJournal of Language, Technology & in Africa*, Vol. 2. No.1. 2010, ISSN 1998-1279 182.

Mittal, V., & Kamakura, W.A. (2001). Satisfaction, Repurchase Intent, and Repurchase Behavior: Investigating the Moderating Effect of Customer Characteristics, *Journal of Marketing Research*, Vol. 38(1), 131-142.

Metawa, S. A. and Almosawi, M. 1998. Banking behavior of Islamic bank customers: perspectives and implications. *International Journal of Bank Marketing*, 16 (7): 299-313.

Mobile Money: the Opportunity for India November, 2013; [www.gsma.com/mobile for development](http://www.gsma.com/mobile-for-development) accessed 23.10.2015

Mobile Phone Subscribers in Bangladesh <http://www.btrc.gov.bd/content/mobile-phone-subscribers-bangladesh-january-2015>.

Nayem, Z., 2010. *Problems of Implementing Citizen Charter: A Study of Upazila Land Office (A. C Land Office)*. Unpublished Master's thesis, submitted to Master in Public Policy and Governance, Department of General and Continuing Education, North South University.

Ndung'u, N. (2009). Money transfer services. Address by, Governor of the Central Bank of Kenya, at the official launch of M-PESA International Money Transfer Service, 13th October. Nairobi.

Okiro.k & Ndungu. J.(2012): The impact of mobile and internet banking on performance of financial institutions in Kenya. Department of Finance and Accounting, School of Business, University of Nairobi, Kenya.

Omwansa, T. (2009). "M-Pesa progress and prospects": Innovations case discussion. <<http://www.strathmore.edu/pdf/innov-gsma-omwansa.pdf>. >Accessed 28th September, 2015.

Park,M .H. and Islam, M. T. (2013):Did Mobile Payments Make Difference in "Unbanked" Rural Communities? Empirical Evidence from the Electronic Money Transform System of the Bangladesh Post Office.

Rahman Atiqur ,Abdullah,Tooheen;(2012): Mobile Money in Bangladesh. Developing Country Studies www.iiste.org ISSN 2224-607X (Paper) ISSN 2225-0565 (Online) Vol 2, No.8, 2012.

Sander, K.K.C, and Mukwana P, (2003) Money Transfer Systems: The Practice and Potential for Products in Kenya.

Safaricom, (May, 2009). *Financial Year 2008/2009; Annual Results Presentation and Investor Update*

Siddiquie. Razib (2014) Scopes and threats of Mobile Financial services in Bangladesh . IOSR Journal of Economics and Finance (IOSR-JEF) e-ISSN: 2321-5933, p-ISSN: 2321-5925.Volume 4, Issue 4. (Jul-Aug. 2014), PP 36-39 www.iosrjournals.org. (print) ISSN 2224-896X (online)Vol 1, No.6, 2011.

Sohel, Rayhan,Islam and Mahjabin(2011): Problems and prospects of mobile banking in Bangladesh. Journal of Information Engineering and Applications www.iiste.org ISSN 2224-5758.

Upadhyaya. Geetanjali ; (2011): ICT application in service delivery: a case of inland revenue department, Nepal .

Wambari, A. and Mwaura, P. (2009). Mobile Banking in Developing Countries. (A Case Study on Kenya). Retrieved January 6, 2012 from <https://publications.theseus.fi/bitstream/>.

Wang, C., Han, X., & Wen, B. (2003). An empirical study of the relationship between customer's satisfaction and loyalty. *Nankai Business Review*, 4, 70-74.

Wanyonyi, w. p. (2013): Influence of Mobile Money Transfer Services on the Performance of Micro Enterprises in Kitale Municipality.

ANNEXURES: I-VII

Annex: I

INTERVIEW FORM (FOR SERVICE-SEEKERS)

This study attempts to understand the performance of electronic Money Transfer service (EMTS) of Bangladesh post office. Questionnaires are designed considering the EMTS users. Hence, EMTS users are the prime respondent for this questionnaire survey. Information disclosed in this interview shall only be used for research work (academic purpose) done as a part of course curriculum of MPPG program of North South University, Dhaka and shall be treated as confidential. I kindly request the EMTS users for close cooperation by providing the correct and valid information.

Researcher

Maksuda Khanam

Student

MPPG program

North South University

Part A: General information

1. Name (optional):

2. Age: (years)

a) Below 20 b) 21-30 c) 31-40 d) 41-50 e) More than 50

3. Gender: M ☐ / F ☐

4. Occupation:

- a. Self employed ____
- b. Employed ____
- c. Student ____
- d. Others

5. Place of residence:

6. Education:

- a. Illiterate ____
- b. below secondary Level ____

- c. Secondary Level –
- d. Higher Secondary Level ____
- e. Bachelor Degree or higher ____

Perceived Easy to Use:

Accessibility:

7. How often do you use EMTS service?

Daily ☐ weekly ☐ Monthly ☐ Yearly ☐

8. How long it takes you to travel for EMTS service?

i) 0-5 km

ii) 6-10 km

iii) 10-15 km

iv) 16-20 km

v) Above 20 km

9. How much money you have to spend as a transport cost for the service?

10. Do you think that the transaction cost of the service is high for you?

☐ Yes ☐ No

If No please write Comment.....

11. How long do you have to stand for the service?

a) Less than ½ an hour ; b) ½ an hour ; c) More than ½ an hour

12. Do you think the EMTS facilities are easily accessible?

a) Strongly agree;b) agree;c) disagree;d) strongly disagree

13. What kind of treatment have you got from the EMTS service provider in the post office?

Indifferent ☐ Friendly ☐ Rude ☐

14. Is post office financially capable to give your payment?

Yes ☐

No ☐

If No please write your comment.....

Perceived Usefulness:

15. Do you think the EMTS is a quick service?

a) Strongly agree; b) agree; c) disagree; d) strongly disagree

16. Do you feel the system is secure?

a) Strongly agree; b) agree; c) disagree; d) strongly disagree

17. Did you manage to complete your transaction task with in a service hour?

Yes ☐

No ☐

User's awareness:

18. How did you come to know about EMTS service?

a) News Paper; b) advertisement c) from relatives or neighbors

d) Others (specify).....

19. Have you seen any publicity on EMTS by the Bangladesh post office to encourage customers to use the service?

Yes ☐

No ☐

If No please write Comment.....

20. Are you satisfied with the EMTS service?

a) Strongly satisfied; b) satisfied; c) dissatisfied; d) strongly dissatisfied

21. Why did you prefer EMTS than other private operator?

22. Do you have any suggestion to improve the service?

i.

ii...

Thanks for your valuable time and cooperation.

Annex: II

INTERVIEW FORM

ইএমটিএস(EMTS)

সেবা গ্রহীতাদের জন্য

এই গবেষণার উদ্দেশ্য হলো বাংলাদেশ ডাক বিভাগ কর্তৃক পরিচালিত EMTS সার্ভিসের কার্যকারিতা পর্যালোচনা করা। এ গবেষণাটি নর্থ সাউথ বিশ্ববিদ্যালয় ঢাকার MPPGকোর্সের একটি অংশ। আমি সেবা গ্রহীতাদের সবিনয়ে অনুরোধ করছি সার্ভিসটি সম্পর্কে নির্ভুল তথ্য দিয়ে সহযোগিতা করার জন্য।

গবেষক

মাকসুদা খানম

শিক্ষার্থী

MPPGপ্রোগ্রাম

নর্থ সাউথ বিশ্ববিদ্যালয়

ঢাকা।

অংশ-ক: সাধারণ তথ্য

১। নাম :

২। বয়স :

(ক) নিম্নে ২০ (খ) ২১-৩০(গ) ৩১-৪০ (ঘ) ৪১-৫০ (ঙ) ৫০ এর উপরে

৩। লিঙ্গঃ

পুরুষ

☐

মহিলা

☐

৪। পেশা :

ক) আত্মনির্ভরশীল(আত্মকর্মসংস্থান)-

খ) চাকরিজীবী-

গ) শিক্ষার্থী-

ঘ) অন্যান্য-

৫। বাসস্থান :

৬। শিক্ষা :

ক) নিরক্ষর-

খ) নিম্ন মাধ্যমিক এর নিচে-

গ) মাধ্যমিক-

ঘ) উচ্চ মাধ্যমিক-

ঙ) স্নাতক অথবা উচ্চতর-

Perceived Easy to Use: (সহজে ব্যবহার করার অনুভূতি)

Accessibility: (প্রবেশাধিকার)

৭। আপনি কতদিন পরপর EMTS সেবা গ্রহণ করেন?

প্রতিদিন সাপ্তাহিক মাসিক বাৎসরিক

৮। এই সেবাটি পেতে আপনাকে কত কিলোমিটার পথ ভ্রমণ করতে হয়েছে?

- ১) ০-৫ কিঃমিঃ
- ২) ৬-১০ কিঃমিঃ
- ৩) ১০-১৫ কিঃমিঃ
- ৪) ১৬-২০ কিঃমিঃ
- ৫) ২০ কিঃমিঃ এর বেশি

৯। সেবাটি পেতে আপনার পরিবহন খরচ কত টাকা হয়েছে?

১০। আপনার কি মনে হয় যে, টাকা পাঠানোর ফিএর পরিমাণ বেশি?

হ্যাঁ না

যদি হ্যাঁ হয়, আপনার মতামত.....

১১। আপনাকে কতক্ষণ অপেক্ষা করে সেবাটি নিতে হয়েছে?

ক) $\frac{1}{2}$ ঘন্টার কম সময়; খ) $\frac{1}{2}$ ঘন্টাগ) $\frac{1}{2}$ ঘন্টার বেশি

১২। আপনি কি মনে করেন এ সেবাটি সহজেই নেওয়া যায়?

ক) প্রবলভাবে একমত খ) একমত গ) একমত নয় ঘ) প্রবলভাবে বিরোধীতা করছি

১৩। বাংলাদেশ ডাক বিভাগের সেবা প্রদানকারীদের নিকট হতে আপনি কি রকমের ব্যবহার পেয়েছেন?

উদাসীন বন্ধুত্বপূর্ণ রুঢ়

১৪। আপনি কি টাকা উত্তোলনের সময় পোস্ট অফিসে পর্যাপ্ত টাকা পেয়েছেন?

হ্যাঁ না

১৪। ক) যদি না হয়,

আপনার মতামত.....

Perceived Usefulness: (উপযোগিতার অনুভূতি)

১৫। আপনি কি মনে করেন উগএর একটি দ্রুতগামী সেবা?

ক) প্রবলভাবে একমত খ) একমত গ) একমত নয় ঘ) প্রবলভাবে বিরোধীতা করছি

১৬। আপনি কি মনে করেন উগএ৩৪ একটি নিরাপদ সেবা?

ক) প্রবলভাবে একমত খ) একমত গ) একমত নয় ঘ) প্রবলভাবে বিরোধীতা করছি

১৭। আপনি কি অফিসের সেবা প্রদানের সময়সূচির মধ্যে আপনার কাজটি সম্পন্ন করেছিলেন?

হ্যাঁ ☐ না ☐

না হলে মতামত দিন.....

User's awareness: (ব্যবহারকারীর সচেতনতা)

১৮। আপনি EMTS সেবাটি সম্পর্কে কিভাবে জানতে পারলেন?

ক) পত্রিকাখ) বিজ্ঞাপন গ) আত্মীয় অথবা প্রতিবেশী ঘ) অন্য উপায়ে(ব্যাখ্যা করুন)

১৯। উগএ৩৪ সেবাটি গ্রহণে গ্রাহককে উৎসাহিত করার জন্য বাংলাদেশ ডাক বিভাগ কর্তৃক কোনো ধরনের প্রচারণা আপনার দৃষ্টিগোচর হয়েছে কিনা?

হ্যাঁ ☐ না ☐

১৯। ক) যদি হ্যাঁ হয় তাহলে কি রকমের প্রচারণা পেয়েছেন?

১) দেয়ালিকা ২) মাইকিং ৩) অন্যান্য (উল্লেখ করুন)

Satisfaction of the user: (ব্যবহারকারীর সন্তুষ্টি):

২০। আপনি কি মনে করেন EMTS সেবাটি আপনার প্রত্যাশা পূরন করেছে?

ক) প্রবলভাবে একমত খ) একমত গ) একমত নয় ঘ) প্রবলভাবে বিরোধীতা করছি

২১। অন্যান্য বেসরকারি সেবাদানকারী প্রতিষ্ঠান রেখে আপনি কেন পোস্ট অফিসে এ সেবাটি নিতে এসেছেন বলবেন কি?

২২। সেবাটির মান উন্নয়নের জন্য আপনার মূল্যবান মতামত দিন?

১।

২।

আপনার মূল্যবান সময় এবং সহযোগিতার জন্য ধন্যবাদ।

Annex: III

Questionnaire Set: B

INTERVIEW FORM (FOR EMTS SERVICE-PROVIDERS):

Objective of questionnaire to service providers: This study attempts to understand the performance of EMTS. The study has hypothesized that Accessibility-(Distance, Time, and Cost), Attitudes of service provider, and sufficient amount money in post office, Quick service, Secured, and User knowledge which determine the performance of EMTS service. This Questionnaire survey is for service providers and attempt to understand the performance of EMTS service of post office.

Interview for the Service Providers:(EMTS operator and post master)

1. Name (optional).....
2. Designation:
3. Work experience:
4. Work Place:

Interview:

5. What devices you are using in EMTS to provide the service?
a. Mobile. b. Land phone c. Internet d. Others
6. Do you think that distance areas people are using the EMTS less than the closer areas people? Can you cite any example please?
7. Are you able to provide the service in time? If no please mention the reason.
8. Do the costumers complain about the cost of the EMTS service offered by the Post office?
a. Yesb .No
- 8.a. If YES please mention.....
9. Do you support the EMTS policy?
10. Do you have sufficient amount of money in post office for more or big transaction of EMTS?
11. Do you think the EMTS facilities are easily accessible?
a) Strongly agree; b) agree; c) disagree; d) strongly disagree
12. Do you think that EMTS service is faster, than the earlier period paper base money order

system? Can you site some example please?

13. Do you think that the EMTS service is known well to society?

i) Yes ii) No.

14.. Do you have any publicity system to increase public awareness about the EMTS service?

i) Yesii) No

14. a. If ‘Yes’, what type of technique do you follow?

1. Postering2. Miking3. Others (please mention):

15. Do you feel the system is secure? Please mention how?

16. Are you able to deliver the service within a short time? If No please mention the reason.

17. How many transactions do you perform daily on an average?

18. What challenges you have to face for conducting the EMTS service?

19. How do you assess the Present condition of EMTS?

a. Very good

b. Moderate good

c. Not good at all

Please mention the reason:

20. How will you assess the performance of EMTS?

a. Very good

b. Moderate good

c. Not good at all

Please mention the reason:

21. What is your opinion why users come to post office for EMTS than other private operation?

22. What measures, you think, should be taken to improve performance of EMTS service?

i).....

ii).....

Thanks for your valuable time and information. Your information will be used only for academic Purpose. Thanks for your cooperation. Thanks for your valuable time and information. Your information will be used only for academic purpose. Thanks for your cooperation.

Annex: IV

Interview Checklist for some Higher Officials

Respondents (Implementers):

1. Director General Bangladesh post office

Date:

Place:

1. Name:

2. Occupation:

3. Designation:

Interview:

1. Do you think that the EMTS service is able to meet the expectation of general people as

the reason it was started in 2010? If No what is the reasons behind it?

.....
.....

2. Do you think the EMTS operators are cooperative to the users?

.....

3. Are you satisfied with the EMTS employees' service providing system?

.....

4. Do you think that the users are getting proper service from the post office?

.....
.....

5. Do you think that post office has sufficient money for big or more transaction? If No Please mention the reason.

.....
.....

6. Do you think that the users are well aware of the opportunities of EMTS service which post office has offered?

.....
.....

7. Have you taken any initiative to increase the public awareness like publicity of the service?

Yes ☐

No ☐

a. If 'No' please mention the reason:

8. What is your opinion why users come to post office for EMTS than other private Operation?

.....

9. What are the challenges of EMTS service?

.....
.....

10. How to overcome those challenges?

.....
.....

11. What are your comments about private providers?

.....
.....

12. How did you measure the performance of EMTS?

.....
.....

Thank you very much for your valuable time and information

Annex: V & VI: Tables

ANNEX: V

Table 2: Data Collection Schedule, Sample and technique:

Duration of the visit	Places of the visit	Number of respondents	Data collection methods
August 10-16	Maulvibazar HPO	20 (1 interview,1 case)	Questionnaire survey and Interview,case
August 18-22	Dhaka University post office	20 (1case)	Questionnaire survey and case
August 23-29	Tangail HPO	20 (1 interview,1 case)	Questionnaire survey and Interview.Case
September 01--03	Director general office	01 interview	Interview and secondary data collect
18 Days	4 places	60Respondents interview,3 cases	3 methods

		Total = 66	
--	--	------------	--

Table 3: Respondents interview of service Implementers.

Sl. no	Designation	Date	Place
1	Director General	03.09.15	Director General office Dhaka
2	Post master Tangail	27.08.15	Tangail HPO
3	EMTS operator Moulvibazar	11.08.15	Moulvibazar HPO

Table 4: Sources of Data Collection:

Independent Variables	Indicators	Type of Data	Sources of Data
Perceived Ease of Use(Accessibility, Attitudes of service provider, Sufficient amount money in post office for big transaction or payment,) Accessibility	Distance,time, cost	Primary data	Questionnaire survey, and in depth interview.
Attitudes of service provider	Positive, negative attitudes or friendly, Rude or indifferent attitude.	Primary data	Questionnaire survey, and in depth interview
Sufficient amount money in post office.	Sufficient amount money in post office for big transaction or payment	Primary data	Questionnaire survey, and in depth interview, case study
Perceived Usefulness (Quick service: Security, Customer's knowledge/Awareness)			
Quick service	Remittance within a few minutes.	Primary data	Questionnaire survey, and in depth interview, case study
Security	well protection by pin code,	Primary data and secondary data	Questionnaire survey, and in depth interview, contend analysis
Customer's knowledge/Awareness	Publicity, Miking etc	Primary data	Questionnaire survey, and in depth interview, case study

Sources of Data:**Dependent variable:****Performance of EMTS**

Satisfaction of the user

Dependent variable	Type of Data	Sources of Data
Satisfaction of the user	Primary data	Questionnaire survey, case study

Socio- economic and demographic characteristics of respondents

The majority of the respondents (38.3%) who use EMTS are relatively middle age, belongs to the age group 31-40; one third of the respondents (33.3%) belongs to the age group 41-50. The age group 21-30 represents only 26.7% respondents. Fewer respondents (1.7 %) age are below 20 years. So, majority of the respondents belongs to the age group 31-40 (See table 5.3).

In terms of gender, the majority of the respondents are male (68%). But compare to male, female use the EMTS service less (See table2). The respondent who use EMTS service had a range of occupations, although majority of the respondents are employed (45%), student 28.3%, 16.7% are self-employed and others 10 % (See table5.3).

Socio-demographic data also shows that the majority of the respondents have education. The majority of the respondents (58.3%) who use the EMTS service has bachelor degree or higher education, only few of them (5%) are illiterate (See the table5.3).

Cross tabulation 5.4**Age of the Respondent and Satisfied from EMTS service**

Age of the Respondent	Satisfied from EMTS service		Total
	Not satisfied	Satisfied	
Below 20	1	0	1
21-30	4	12	16
31-40	10	13	23
41-50	5	15	20
Total	20	40	60

The variation of the satisfaction is not significant

Cross tabulation 5.6:
Gender of the Respondent and Satisfied from EMTS service

Gender of the Respondent	Satisfied from EMTS service		Total
	Not satisfied	Satisfied	
Male	15	26	41
Female	5	14	19
Total	20	40	60

The variation of the satisfaction is not significant

Cross tabulation 5.7:
Occupation of the Respondent and Satisfied from EMTS service

Occupation of the Respondent	Satisfied from EMTS service		Total
	Not satisfied	Satisfied	
Self employed	5	5	10
Employed	10	17	27
Student	3	14	17
Others	2	4	6
Total	20	40	60

The variation of the satisfaction is not significant

Cross tabulation 5.8:
 Education of the respondent and Satisfied from EMTS service.

Education of the respondent	Satisfied from EMTS service		Total
	Not satisfied	Satisfied	
Illiterate	0	3	3
Below secondary level	4	4	8
Secondary level	0	1	1
HSC level	5	8	13
Bachelor degree or higher	11	24	35
Total	20	40	60

The variation of the satisfaction is not significant

5.3.1: Test of Hypothesis at a glance

Null Hypothesis	Chi-square	p-value	Decision	Remarks
There is no relation between area and satisfaction	4.19	0.242	accepted	No significant relation
There is no relation between age and satisfaction	4.200	0.122	accepted	No significant relation
There is no relation between Gender and satisfaction	.616	0.432	accepted	No significant relation
There is no relation between Occupation and satisfaction	3.299	0.348	accepted	No significant relation

Table 5.23: Users of EMTS

Year	Users	Percentage (%)
2010-11	1799345	14
2011-12	4880337	39
2012-13	3903527	31
2013-14	1286486	10
2014-15	544082	4
Total	12413777	100

Source: EMTS server report 2015

Table 5.24: Revenue income of post office by EMTS

Year	Revenue (BDT)	Percentage (%)
2010-11	92382924	11
2011-12	282259928	35
2012-13	260085908	32
2013-14	120359175	15
2014-15	60362950	7
Total	815450885	100

Source: EMTS server report 2015

Table 5.25: Reason of preferring EMTS than other private operator

Reasons	Frequency	Percent (%)
Feel secured as it is a Govt. service	44	73.3
PO is close to me	6	10.0
Low cost	7	11.7
Others	3	5.0
Total	60	100.0

Q. Why did you prefer EMTS than other private operator? (n=60),

Table 5.26: Recommendations

	Frequency	Percent
Need more advertisement	18	30.0
Establish more outlet	21	35.0
Should keep adequate money supply in branch/sub post office	9	15.0
Others	12	20.0
Total	60	100.0

Source of Information (n=60), Field Survey 2015

Annex VII: Chi-Square Tests:

Table 6.1 Chi-Square Tests: Study area

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	4.200 ^a	2	.122
Likelihood Ratio	4.205	2	.122
N of Valid Cases	60		

**Chi-Square Tests Table 6.2:
Age of the Respondent and Satisfied from EMTS service**

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	4.190 ^a	3	.242
Likelihood Ratio	4.401	3	.221
N of Valid Cases	60		

a. 2 cells (25.0%) have expected count less than 5. The minimum expected count is .33.

Chi-Square Tests Table 6.3:
Gender of the Respondent and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	.616 ^a	1	.432
Continuity Correction ^b	.241	1	.624
Likelihood Ratio	.631	1	.427
Fisher's Exact Test			
N of Valid Cases ^b	60		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 6.33.

b. Computed only for a 2x2 table

Chi-Square Tests Table 6.4:
Chi-Square Tests: Occupation of the Respondent and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	3.299 ^a	3	.348
Likelihood Ratio	3.442	3	.328
N of Valid Cases	60		

a. 3 cells (37.5%) have expected count less than 5. The minimum expected count is 2.00.

Chi-Square Tests Table 6.5:
Education of the respondent and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	3.211 ^a	4	.523
Likelihood Ratio	4.394	4	.355
N of Valid Cases	60		

a. 6 cells (60.0%) have expected count less than 5. The minimum expected count is .33.

Chi-Square Tests Table 6.6:
Easily accessible and Satisfaction from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	25.711 ^a	2	.000
Likelihood Ratio	26.043	2	.000
N of Valid Cases	60		

a. 2 cells (33.3%) have expected count less than 5. The minimum expected count is .33.

Chi-square test table 6.7: Attitude of the service provider and Satisfaction

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	4.922 ^a	2	.045
Likelihood Ratio	7.373	2	.025
N of Valid Cases	60		

a. 2 cells (33.3%) have expected count less than 5. The minimum expected count is 2.67.

Chi-Square Test Table 6.8:
Financial Capacity of post office and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) / (p-value)
Pearson Chi-Square	11.760 ^a	1	.001
Continuity Correction ^b	9.375	1	.002
Likelihood Ratio	11.266	1	.001
Fisher's Exact Test			
N of Valid Cases ^b	60		

a. 1 cells (25.0%) have expected count less than 5. The minimum expected count is 3.33

b. Computed only for a 2x2 table

Chi-Square Tests Table 6.9:
Security of EMTS and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	4.138 ^a	1	.042
Continuity Correction ^b	1.616	1	.204
Likelihood Ratio	4.534	1	.033
Fisher's Exact Test			
N of Valid Cases ^b	60		

a. 2 cells (50.0%) have expected count less than 5. The minimum expected count is .67

.b. Computed only for a 2x2 table

Chi-Square Tests Table 6.10:
EMTS service is a quick service and Satisfied from EMTS service

	Value	df	Asymp. Sig. (2-sided) (p-value)
Pearson Chi-Square	35.838 ^a	1	.000
Continuity Correction ^b	32.227	1	.000
Likelihood Ratio	37.744	1	.000
Fisher's Exact Test			
N of Valid Cases ^b	60		

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 5.33

b. Computed only for a 2x2 table

Annex: VII

List of Officials Interviewed at the Top Administrative and Field Level

Implementer: Director General of Bangladesh post office.

Place: Director General Office.

Name: A.B.M Humayun

Occupation: BCS postal Cader

Designation: Director General

Service Providers:(post master)

Name(optional). MD. Abu Taiyeb

Designation: Post Master

Work experience: 11 years

Work Place: Post master Tangail Head Post office

Service Providers: (EMTS operator)

Name (optional) Md. Babul khan

Designation: EMTS operator

Work experience: 3 years

Work Place: Moulvibazar Head post office