

Institutional Mechanism of E-TIN: Bangladesh Experience

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This paper investigates the institutional mechanisms of Electronic Tax Identification Number (e-TIN) in Bangladesh. Tax is the main source of revenue for any government. Effective and efficient revenue collection procedures are urged for developing countries by donor agencies. Bangladesh, which is aimed to digitization in recent years from the government have issued E-TIN to the citizen to motivate in paying tax. It is argued that E-TIN can ensure the effectiveness and efficiency of tax collection as well. This paper has reviewed the institutionalization scenario of adopting E-TIN, which helped the government to accelerate revenue collection for the country. For the purpose of our study, we have conducted a structured questionnaire survey on different 40 banks out of total 66 banks in Bangladesh. It is expected that the paper will be helpful to understand the scenario of adopting E-TIN in developing nations and will be beneficial for the developing nations also who are aiming to adopt E-TIN.

Keywords: E-TIN; Institutional Mechanisms; Government Revenue; Developing Country; Bangladesh

JEL Codes: H11, H26 and K34

1. Introduction

Tax is the main source of revenue for the government of any country. Bangladesh, a developing country that faces problem in developing a balanced budget is under the pressure of the donor agencies' to increase the efficiency of tax collection. The current government, which is aimed to digitization the nations have pursued the Electronic tax identification number (E-TIN) with the aim of enhancing the effectiveness and efficiency of tax collection procedure. Under this scenario, TIN (Taxpayer's Identification Number) Certificate is very important documents for Bangladeshi personnel. The TIN is a unique number provided by the NBR (National Board of Revenue) if anybody applies for getting it. A study shows that in a country of 153.6 million people, only 1.2 million individual and companies/organizations paid income tax in Bangladesh during the assessment year 2014-15, which is less than 1% of the total population (Bangladesh ministry of Finance 2015), whereas almost 5 million people holding Taxpayer's Identification Number (TIN) in the country.

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For this reason, NBR cited a new rule for deduction of tax at source of interest amount of the Bank depositors. According to the new rules incorporated in the Finance Act-2012, the bank will have to deduct 15% tax at source from the interest amount of bank depositors, having deposits above taka 1,00,000/- instead of 10% in case of failure to provide TIN Certificate to the respective bank. In Bangladesh TIN Certificate is a need for various daily affairs such as opening L/C (Letter of credit), renewal of trade license, submitting of tender documents, ERC (Export registration certificate), IRC (Import registration certificate), VAT (value added tax) Registration, Company Registration, issue of Credit Cards and many others.

Main purpose of statement of this study is to conduct a research to find out whether the E-TIN accelerate the revenue collection for the country or not? Objectives of the study, is to understand the tax structure of Bangladesh before and after E-TIN. What is process for having E-TIN? What is the importance of E-TIN in revenue collection for the country?

Previous studies from different country discussed about the impact of taxation on different sector from developing countries and involvement of technological advancement into tax system. However, this study will investigate structure, provision, and its affect on revenue collection for developing country, which is completely new in terms of findings.

The rest of the paper arranged in five parts. Second section deals with the E-TIN experiences in previous literature. The third section describes the method used. The fourth section deals with the discussion of the provisions and structure of E-TIN in Bangladesh and it discusses the affect of E-TIN on revenue collection of the country and the findings. The fifth section focuses on a general discussion. Last section focuses on the conclusion and limitations of the paper.

2. Literature Review

The advancement of information technology can help the government in various ways. To increase the efficiency of revenue collection, government can take help from information technology. In the international community, it has been found that information technology allows governments to serve citizens in a more timely, effective, and cost-efficient method (Evans and Yen, 2006). In spite of primary challenges, information technology can intensify the relationship between the citizen and the government. This notion is seemed valid for the revenue collection of government also.

Previous research finds that electronic tax filing methods has increased the taxpaying intention of the citizen (Fu et al. 2005). Researchers have tried to identify the factors that increase the acceptance of the tax filing and payment systems of the citizen also (e.g., Hung et al. 2006). Previous study has noticed the perceived usefulness and perceived ease of use of the tax filing systems for motivating the taxpaying intention (Change et al. 2005). Moreover, computer self-efficacy of taxpayers has been identified as a factor of payment of tax through e-governance (Wang, 2002). Researchers have found that low income tax payers are motivated by electronic tax system also (e.g. Kopczuk and Cristian, 2007).

Previous research also finds that TIN has facilitated and making sure, the exact identification accounts or transaction extracted from which document and it is indispensable in tracking down and monitoring the transaction of taxpayers with the tax bureau. As a result, it is used in the identification of delinquent accounts the verification of declarations made by the taxpayer as to

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their tax liabilities (Pabilona 2014). Furthermore, another issue noticed that taxpayer awareness has a full mediating role in the relationship between expediency tax id number, service quality and taxpayers compliance where as it has no mediating role in the relationship between tax socialization, taxpayers knowledge and taxpayers compliance (Andreas 2015). However, no researches talked about the how adaptation of E-TIN is accelerating the revenue collection of a country. In addition, obviously, if we look at the wide arena, there is a relation between E-TIN on identification of the taxpayers and accelerating revenue collection.

H1: There is no relationship between E-TIN and taxpayer compliance.

H2: There is no relationship between E-TIN and revenue collection from tax.

3. Methods

For the purpose of our study, we have conducted a structured questionnaire survey based on the literate review on 40 people who are currently working in 40 different banks in tax department in Bangladesh. Statistical package for the social sciences (SPSS) used for the data analysis. Furthermore, mean, percentage, standard deviation were used to determine the effectiveness of the E-TIN.

4. Provisions and Structure of E-TIN in Bangladesh

4.1 National Board of Revenue (NBR)

The National Board of Revenue (NBR) is the apex authority for tax administration in Bangladesh. It was established by the father of the nation Bangabandhu Sheikh Mujibur Rahman under President's Order No. 76 of 1972. Administratively, it is under the Internal Resources Division (IRD) of the Ministry of Finance (MoF). The Secretary, IRD is the ex-officio Chairman of NBR.

NBR is responsible for formulation and continuous re-appraisal of tax-policies and tax-laws, negotiating tax treaties with foreign governments and participating in inter-ministerial deliberations on economic issues having a bearing on fiscal policies and tax administration. The main responsibility of NBR is to collect tax revenues (primarily, Value Added Tax, Customs Duty, Excise Duty and Income Tax). It works with three tax-type wings namely, Customs Wing, VAT Wing and Income Tax Wing. There are two more wings, named IT wing and Research & Statistics wing under NBR.

4.2 Main Duties of NBR

Responsibility for carrying out the administration of the major tax revenues in Bangladesh (income taxes, customs & excise duties and value-added tax) is vested in the National Board of Revenue (NBR). The NBR was set up under the provisions of the National Board of Revenue Order, 1972 (President's Order No. 76 of 1972). The main duties of the NBR are to:

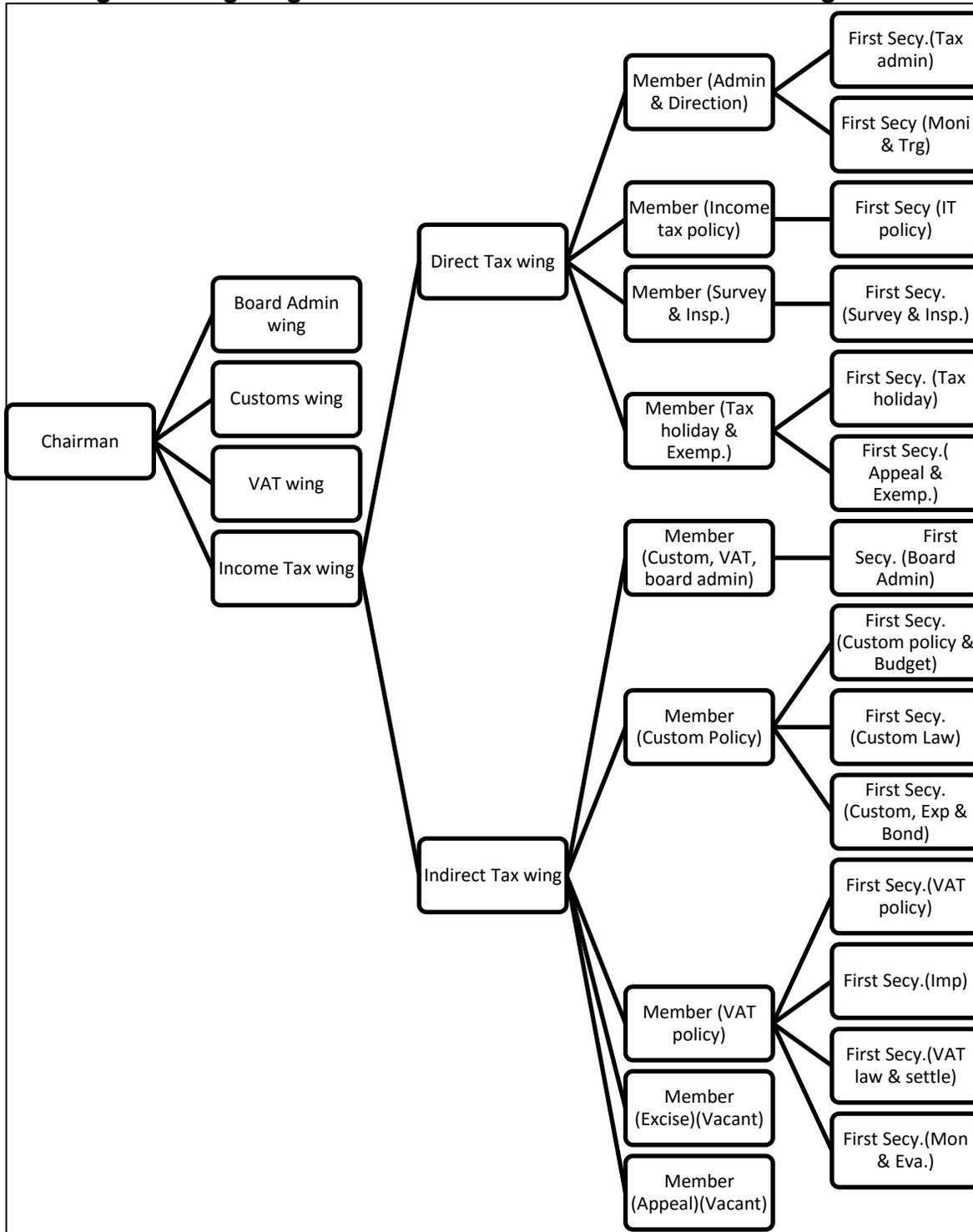
- Draft laws and rules for the purpose of regulating and collecting various direct and indirect taxes;
- Assist the Government in matters of formulating tax policies and laws;
- Prepare receipts estimate;

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- Oversee the administration of the assessment, collection and accounting for major taxes – income taxes, customs and excise duties and VAT; and
- Settle various tax appeals and revision cases.

4.3 Organogram for NBR (Including Income Tax wing)

Figure 1: Organogram of National Board of Revenue of Bangladesh



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An organ gram of the main division of responsibilities of the NBR HQ is shown in figure 1. Day to day responsibility for assessing and collecting the above taxes is carried out in various offices all over Bangladesh. The offices can be divided into two main groups, one for Income Taxes and the second for Customs, Excise and VAT, as follows.

4.3.1 Income Tax Administration

For income tax purposes, Bangladesh is divided into 13 Zones, including 8 in Dhaka. A Commissioner who has oversight of assessment and collection of income taxes heads each Zone. Each zone is further divided into circles for the purposes of assessment and collection of income taxes. The zone and circle offices will be key locations for the purposes of substantive testing of income taxes.

There are a number of other income tax offices, which deal with appeals, settlements, inspection, tax surveys, and vigilance and enquiry. There is also a Tax Training Academy in Dhaka.

4.3.2 Customs, Excise and VAT

These taxes are assessed and collected via 9 offices around Bangladesh. Three are known as Customs Houses and are based in Dhaka, Chittagong and Khulna. These customs houses deal with the major revenues collectable at airports and ports. There are six other offices covering the rest of Bangladesh. A Commissioner of Customs, Excise and VAT heads each of the nine offices. There are also a number of other offices, which deal with appeals, inspection, credits/refunds, and duty appraisals. There is a separate Training Academy covering Customs, Excise and VAT training based in Chittagong. These income tax, customs, excise and VAT offices will be key locations for substantive tests of these Government revenues.

4.4 Tax Collection Process by NBR

There are a limited number of computers available to tax officials for assessment and collection activities, and most information and evidence needed by auditors is still maintained manually at present. Even where computers are used, the reliability of data will still need to be reviewed. Apart from major legislation, there are a number of SROs and manuals of guidance for tax officials. These documents will be essential references for auditors as well.

A wide range of internal controls should be exercised by NBR for each type of tax (income tax, customs & excise and VAT). Internal control should be exercised at many levels. For example, at the highest level, the NBR Board supervises the administration of all these taxes. Board members and first secretaries will have control responsibilities in certain tax areas or functions, as outlined in the organ gram. At the offices where assessment and collection is carried out, supervising officers carry out supervision of the work of tax officials. In addition, there are tax-monitoring officers who review the reports of progress in collecting taxes. Finally, there is an internal audit function.

There have been a number of reform initiatives carried out on aspects of the NBR functions over the past 10 years, with assistance from various development partners. A number of these are still ongoing including the Revenue Administration Modernization Program (RAMP). The RAMP concept of reforms has received wide support from the NBR and others. It is an ambitious 9-year

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plan to carry out reforms in procedures and processes. Although this program is long-term, auditors must be aware of these developments and adjust their audit approach accordingly. This will be addressed annually by the DG, Local & Revenue Audit, and reflected in the strategic and annual planning process.

4.5 Main Problems Faced by NBR

The NBR is faced with similar problems to those of Revenue authorities in other countries. The main risk is that revenue is not assessed, collected or accounted for to the extent determined by the Government. Administration of taxes is exacerbated in Bangladesh by a lack of adequate systems, particularly IT systems, and procedures as noted above.

The main problems could be classified as follows:

- A lack of identity of all persons or transactions subject to tax;
- Identified taxpayers are not assessed – properly or correctly;
- Sums assessed as due are not correctly recorded;
- Sums recorded as due are not collected – promptly or at all; and
- Taxes unpaid are not followed up with due diligence. Revenue auditors should be aware of the problems faced by the NBR and its officials. Auditors should approach their work in a constructive manner as well as providing the NBR with an independent audit assessment of its operations.

4.6 Tax Payer's Identification Number (TIN)

As a part of the tax reform initiatives, Taxpayer's Identification Number (TIN) has been introduced by the Finance Act 1993, introducing a Section 184B in the ITO (Income Tax Ordinance), 1984 and has taken into effect on July 1, 1994. According to which, every assessee or persons applies manually or electronically for TIN will be issued a certificate containing 12-digits TIN. The application may be submitted electronically through the website hosted by NBR or manually in the prescribed form. Here, it is to be provided that the TIN may be issued without any application where any income tax authority has found a person having taxable income during the and has failed to apply before issuance of the number. The board may, by general or special order in writing, direct any person who already holds a TIN to furnish such information or documents for the purpose of re-registration and thereafter issue a new twelve-digit taxpayer identification number. Every existing assessee having ten-digit taxpayer's identification number or temporary registration number (TRN) shall have to obtain twelve-digit taxpayer's identification number (TIN) before the last day of submission of return of income as required under section 75.

4.6.1 The Process of Getting Manual TIN

TIN Certificate is very important for Bangladeshi citizen who needs to pay Income Tax, collection of IRC Bangladesh, ERC Bangladesh, L/C opening, and Trade License renewal, Company Registration in Bangladesh, VAT Registration, and Renewal of Vehicle fitness.

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For Personal TIN Certificate:

- 3 Copies of photograph
- Copy of National ID/ Passport

For Company TIN Certificate:

- Copy of Incorporation Certificate (If Limited Company)
- Copy of Memorandum of Articles (If Limited Company)
- Copy of Partnership agreement (If Partnership Business)
- 3 Copies of photograph of Chairman/MD
- TIN Certificates of all Directors (If Limited Company)
- Copy of trade license

4.7 E-TIN (Electronic Tax Payer's Identification Number)

Electronic Tax Identification Number (E-TIN) registration process started in Bangladesh on July 1, 2013. This process is online. NRB has published a circular about this matter. Another change came into effect from July 1, 2013. As up to, June 30, 2013, TIN was for 10-digit number. However, in the new system, TAX Identification Number (TIN) number will be a 12-digit number. All new taxpayers will get 12-digit number; also, existing Taxpayer also has to get new 12 digit TIN number. Anyone can get their new TIN number from home by fulfilling their information on the website www.incometax.gov.bd. From January 1, 2014, all 10 digit TIN number becomes invalid. Therefore, NRB requested all taxpayers to collect new 12 digit TIN number that is going to be effective from 2013-2014 income years.

4.7.1 Process of E-TIN Registration

In previous time, it was very difficult for Tax Payers to get TIN number. Now, as part of digitalization any individual can get his/her TIN number and TIN certificate from anywhere of Bangladesh through online. From Fiscal Year 2013-2014 the TIN number will get from online server. It will not match without National Identity Number (NID). Someone needs not to go the National Board of Revenue (NBR- www.nbr.gov.bd) or need not to meet with a TAX officer. This initiative was taken by the National Board of Revenue (NBR) to reduce fraudulent on TIN and public troubling. The current TIN holder also needs to update their information in online server. If any individuals have no online facility, he/she can collect his/her TIN certificate from his Tax area. Separate Online Tax Helping Desk is opened for each Tax Zonal Office. With the new system, the existing 10-digit TIN will be replaced with 12-digit ones. According to the newly introduced system, computer generated TIN certificates will be issued as soon as the application procedure is completed online.

The interested individuals will require to login in a specific website (www.incometax.gov.bd) and provide your National Identity Number (NID), and then all of your information will be generated automatically. After inserting all requirements the concerned person will get his/her TIN number and certificate robotically. On the other hand, Organizations also need to collect the e-TIN. The on hand institutional income taxpayers only need to enter their Incorporate Certificate (IC) digit in

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websites and all of information will simplify automatically. For this purpose, NBR has signed a Memorandum of Understanding (MOU) with Private and Public Ltd Company Registration Office.

4.7.2 Findings and Analysis

A. Demographic Information of Respondents:

The result from Table –1 shows that 75% of total data is collected from the persons who are currently working as senior officer position at different banks. It also shows that 52.5% of total respondents are working in banks since less than 5 years; 57.5% of total respondents are holding a MBA degree and 62.5% of total respondents from age group 30 to 40.

Table 1: Demographic Information of Respondents

Factors		Frequency	Percentage
1. Position of the Respondent	Director	1	2.5
	Manager	6	15
	AGM	3	7.5
	Senior Officer	30	75
	Total	40	100
3. Duration of professional experience (in Year)	Below 5	21	52.5
	5 to 10	11	27.5
	Above 10	8	20
	Total	40	100
4. Qualification in accounting	BBA	12	30
	MBA	23	57.5
	CMA	1	2.5
	CA	4	10
	Total	40	100
5. Age group of the respondent	Below 30	7	17.5
	30 to 40	25	62.5
	40 to 50	7	17.5
	Above 50	1	2.5
	Total	40	100

Source: own analysis from opinion survey conducted in Jan- Mar 201

B. Use of E-TIN in Taxpayer Compliance:

Table -2 show that 50% of total respondent uses E-TIN for determining income level related decision that has an arithmetic mean of 1.83 means it is significant and standard deviation of 1.08 support that. Means E-TIN has a significant affects on making decisions related to income level. It also shows that from the all components of the taxpayer compliance, lack of education on tax knowledge related decision gives a higher arithmetic mean of 2.05 which means it is least accepted and tax structure related decision gives an arithmetic mean of 1.8 which means it is highly accepted. Table -2 also tells that average arithmetic mean of using E-TIN for making taxpayer compliance decision is 1.9 which is significant, means Null hypothesis (H_1) is rejected that means E-TIN has a significant relationship with the taxpayer compliance.

Table 2: Use of E-TIN in Taxpayer Compliance

Variables	Strongly agree(1)	Agree(2)	Neutral (3)	Disagree(4)	Strongly disagree(5)	Total	Mean	SD
Income level	14 (35%)	20 (50%)	5 (12.5%)	1 (2.5%)	0 (0%)	40 (100%)	1.825	1.08
Occupation	10 (25%)	24 (60%)	6 (15%)	0 (0%)	0 (0%)	40 (100%)	1.9	1.071
Tax Structure	17 (42.5%)	15 (37.5%)	7 (17.5%)	1 (2.5%)	0 (0%)	40 (100%)	1.8	1.085
Lack of Education on Tax	15 (37.5%)	11 (27.5%)	11 (27.5%)	3 (7.5%)	0 (0%)	40 (100%)	2.05	1.095

Source: own analysis from opinion survey conducted in Jan- Mar 2016

C. Use of E-TIN in Revenue Collection from Tax Area:

Table -3 demonstrate that 70% of total respondent uses E-TIN for making tax revenue from individuals related decision that has an arithmetic mean of 2.25 means it is significant and standard deviation of 1.07 also support that. Means E-TIN has a significant affects on making decisions related to tax revenue from individuals. It also shows that from the all variables of the tax revenue collection from corporate related decision gives a higher arithmetic mean of 2.63, which means it is least accepted, and economic stability related decision gives an arithmetic mean of 2.2, which means it is highly accepted. Table -3 also tells that average arithmetic mean of using E-TIN for tax revenue collection is 2.4, which is significant. Null hypothesis (H_2) is rejected that means E-TIN has a major relationships with revenue collection from tax area in Bangladesh.

Table 3: Use of E-TIN as Revenue Collection from Tax for the Country

Variables	Strongly Agree(1)	Agree(2)	Neutral(3)	Disagree(4)	Strongly disagree(5)	Total	Mean	SD
Tax revenue from individuals	2 (5%)	28 (70%)	8 (20%)	2 (5%)	0 (0%)	40 (100%)	2.25	1.071
Tax revenue from corporate	4 (10%)	12 (30%)	20 (50%)	3 (7.5%)	1 (2.5%)	40 (100%)	2.625	1.088
Value Added Tax	6 (15%)	22 (55%)	10 (25%)	1 (2.5%)	1 (2.5%)	40 (100%)	2.225	1.086
Economic stability	6 (15%)	21 (52.5%)	12 (30%)	1 (2.5%)	0 (0%)	40 (100%)	2.2	1.078

Source: own analysis from opinion survey conducted in Jan- Mar 2016

5. Discussion

In the discussion, we can say that the National board of revenue has taken a better initiative by implementing E-TIN system, which makes life easier for taxpayers, as they do not need to go to the NBR office directly to get their TIN. Now they are getting it through online, which obviously less time consuming and reduced difficulties that the taxpayers has had to face previously for getting manual TIN. However, critics in international research mention that very often e-government has fallen in the challenges of public trust. Therefore, it is the responsibility of NBR to boost the beliefs in citizen that government is efficient and effective (West, 2004).

Generally, there was a remarkable improvement in tax administration in the area of tax assessment and collection with the adoption of E-TIN. In addition, this facilitates the sharing of information among tax authorities and paves the way of expedient and efficient use of taxpayer's information. The use of a unique code or identifier eliminates multiple taxpayers' registration, increase tax compliance and widens the tax base through the registration of all eligible taxpayers, which eventually leads to an increase in tax collection for the government.

Moreover, in Bangladesh like other developing countries, do not have internet facility all over the country, so it is not possible for the people who are living in rural parts of the country and even if there is internet facility, there are some lacking in internet literacy among the rural people. So aim of providing E-TIN conveniently to the taxpayers as a part revenue collection for the country again under in big question mark. So ultimately, NBR needs to set up local offices in rural areas to find out capable taxpayer and to get them registered for E-TIN by the help of the local office to ensure that the government can meet their expected revenue receipt.

This paper describes the current procedure of TIN and E-TIN. In addition, it describes the positive site and negative site digitalization of getting TIN in a developing country though which other developing countries will be able to understand the impact of digitalization of TIN on revenue collection for the country, which is very new as outcome from other journals. In future, there are

some prospects to work with the implications on the process of having E-TIN in Bangladesh, which can be very helpful and will become a role model for other developing countries if they are planning to adopt E-TIN.

6. Conclusions

The study reviews the E-TIN infrastructure in a developing country including the functions of the old TIN system, procedures for getting the TIN number, functions and importance of E-TIN and the procedures for getting E-TIN. Tax is the most important sources of collection of revenue for the government. Therefore, the initiation of NBR of Bangladesh to adopt E-TIN is appreciable as it has a positive impact on tax collection. By adopting E-TIN Bangladesh is now in the stage of adopting online tax filing and paying systems, which has already adopted by many developed countries. It is expected that this study will be helpful for the other developing countries who are heading for accepting E-TIN system for their country.

The findings as mentioned above explains that in order to raise awareness of taxpayers in paying tax, they need to get a better understanding of the tax regulations through NBR awareness programs. Awareness of taxpayer deemed to encourage tax compliance to various tax regulations. Furthermore, to accelerate revenue collection for the government from the tax sector can be suggested to tax authorities to continuously by providing training on that particular sector with improve quality of service to encourage tax compliance. There were some limitations too of the study as the study only focused on the banking sector of Bangladesh.

References

- Andreas, ES 2015, 'The effect of tax socialization, tax knowledge, expediency of tax id number and service quality on taxpayers compliance with taxpayer awareness as mediating variable', *Procedia-social and behavioral sciences*, Vol. 211, pp. 163-169.
- Chang, I-Chiu, Li, Yi-Chang, Hung, Won-Fu and Hwang, Hisn-Ginn 2005, 'An empirical study on the impact of quality antecedents on tax payers' acceptance of internet tax-filing systems', *Government Information Quarterly*, Vol. 22, pp. 389-410.
- Evans, D and Yen, DC 2006, 'E-Government: Evolving relationship of citizens and government, domestic, and international development', *Government Information Quarterly*, Vol. 23, pp. 207-235.
- Fu, JR, Farn, CK and Chao, WP 2006, 'Acceptance of electronic tax filing: A study of taxpayer intentions', *Information and Management*, Vol. 3, pp. 109-126.
- Hung, Shin-Yuan, Chang, Chia-Ming and Yu, Ting-Jing 2006, 'Determinants of user acceptance of the e-Government services: the case of online tax filing and payment system', *Government Information Quarterly*, Vol. 23, pp. 97-122.
- Kopczuk, W and Pop-Eleches, C 2007, 'Filing, tax preparers and participation in the earned income tax credit', *Journal of Public Economics*, Vol. 91, pp. 1351-1367.
- Pabilona, Jocet-Consisa R 2014, 'Taxpayer identification number (TIN): its development and importance in tax administration', *NTRC tax research journal*, Vol. 27, no. 6, pp. 1-14.
- Wang, Yi-Shun 2002, 'The adaptation of electronic tax filing systems: an empirical study', *Government Information Quarterly*, Vol. 20, pp. 333-352.

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West, DM 2004, 'E-Government and the transformation of service delivery and citizen attitudes', *Public Administration Review*, Vol. 64, no. 1, pp. 15-27.