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The Impact of Capital Market Listing of Companies on National Tax Revenues: The Case of Bangladesh

Abstract

Capital market of Bangladesh is in a race of development; the growth of which has been significantly increasing since the last decade. The motivation of tax policy for bringing more participation of fund raisers into the capital market is relatively important to consider. Thus, the study on “The impact of companies' listing into capital market on national tax revenues: The case of Bangladesh” was founded on finding whether the curtailed tax liability percentage applicable to the listed companies relative to the unlisted companies is sufficient to face the tax revenue outputs from the listed companies relative to the unlisted companies. The study considered only the corporate tax of pre-IPO financial statements and post-IPO financial statements. The study has tried to discover the tax differences between the datasets in different paradigms. With data from feasible time frame, and application of feasible methodology, it has been found that, even if tax percentage is lower to listed companies than to unlisted companies, the average tax disbursed by the listed companies to government is much higher than the unlisted companies which indicates a very positive guideline to policymakers for motivating companies with curtailing tax percentage to another level and increasing number of listed companies and total tax revenues simultaneously.

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1. Background of the Study

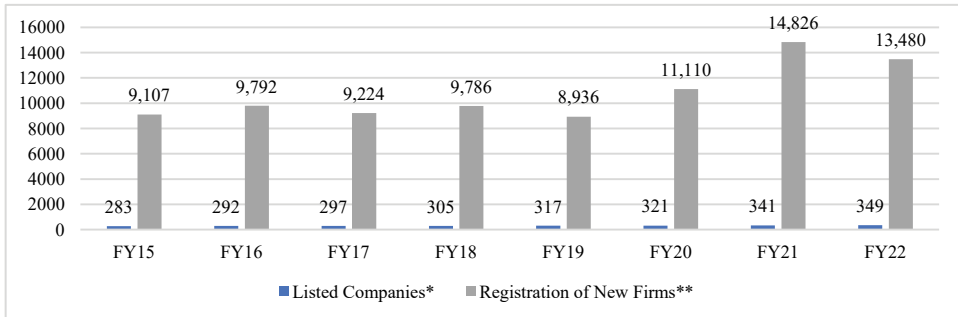
A robust financial system is prerequisite for economic development since it acts as a transmission channel of money from surplus to deficit unit. Building a nation with sustainable economic growth and a thriving economy requires an effective, well-developed financial system, which is where faster economic growth is typically observed. The size of the banking system and the liquidity of the stock markets tend to have a significant beneficial influence on

economic expansion (Adekunle et al., 2013). Thus, an efficient financial system works as a catalyst for the economic development of a country. However, a country's long-term investment is supposed to be met from the long-term fund. Stock market plays a vital role in such accumulation and dissemination of the long-term capital.

In reality, a large number of public firms remain unlisted due to the inherent benefit of being unlisted. If we observe the following graph, we can see that there is a signifi-

cant deviation between the number of firms per year. This infers that a large number of firms remains unlisted.

Figure 1: Number of Listed Companies vs. Registration of New Firms



*Listed companies include those in Dhaka Stock Exchange

**Registration of new firms include public companies, private companies, foreign companies' liaison office, partnership firms, trade organizations, societies, and one person companies.

Source: RJSC and CEIC

In such a case, policy measures like favorable taxation could play a vital role in bringing more companies to be listed in stock exchange. As of April 2023, the total number of registered companies in RJSC is around 2,08,013 whereas, number of listed companies in Dhaka Stock Exchange is 350, which is only 0.16% of the total number. The tendency of the unlisted companies to evade tax worsens the existing tax gap. For example, as per RJSC statistics, out of 2,75,460 registered business entities, only 1,67,100 companies hold TINs and of them, around 60 percentage are yet to submit tax returns. According to the report of Tax Justice of Network 2021, Bangladesh loses around \$143 million tax every year to global tax abuse, which is around 0.79% of tax revenue. Of them, \$118 million is lost due to tax abuse by multinational corporations and rest \$26 million by private individuals. Thus, our Tax-to-GDP ratio is around 9 percent which is the lowest in South Asia.

Currently the applicable tax rate for the listed and unlisted companies is around 20 and 27.5 percentage respectively. However, a company which has floated more than 10

percent of its shares through Initial Public Offering (IPO) enjoys 20 percentage but companies which have floated less than or equal to 10 percent shares through IPO need to pay 22.5 percent. The effective tax rate becomes higher due to the implication of some provisions in the tax laws as well as the deduction of tax at source. In addition, the listed companies face double taxation, with the first tax being paid before paying dividend as well as the dividend income tax paid by the investors. As the listed companies need to publish their financial statements as well as for other disclosers, their chance of tax evasion is very negligible. The tax gap between listed and unlisted companies in Bangladesh are 7.5 percentage since 2020-21 though it was 10 percentage in 2006-07.

This study reveals that whether this exemption of 7.5 percentage will have any significant impact on the National Board Revenue (NBR). Although such exemption may resemble reduction of the gross tax receipt of the listed companies, it may not decrease the gross tax receipt of national coffers. Therefore, the listing of companies into capital market may have either effect on the

national tax revenue, which is exactly the subject matter of the study.

1.1 Rationale of the Study

Firstly, there is a low level of intuition of the respective authority to understand how public listing can impact the tax revenue which is why, the research is necessary. Secondly, the understanding of tax difference between two different statuses of companies i.e., pre-listing and post-listing, is necessary for the prospective companies who are about to step into Initial Public Offering (IPO). Finally, the study will help to identify the policy makers to have a nation-benefitted judgement while formulating tax policy for the prospective companies so that they may have a positive enthusiasm to get enlisted into capital market.

1.2 Research Question

What is the impact of companies' listing into capital market on national tax revenues of Bangladesh?

1.3 Research Objectives

In line with the research question, the study encompasses the following objectives:

Primary Objective:

* To identify the impact of listing into capital market on national tax revenues of Bangladesh.

Secondary Objectives:

1. To explore the corporate tax growth of the companies after listing into capital market
2. To explore sector-wise gross payment to national coffers in pre-listing and post-listing periods
3. To explore year-wise growth rate of tax payment after listing into capital market
4. To identify the trend of government total tax collection and corporate tax collection
5. To find out how much companies are paying in tax per unit of sales
6. To find which methods of listing generate more tax to the government

Therefore, to understand the significance of the companies' listing into capital market on the national tax revenue, this study will discover the corporate tax disbursement of the companies before and after listing in the capital market as well as to find out if the listing of companies can also increase the tax revenue of the national coffers.

2. Literature Review

A number of studies found the role of stock market on economic growth. A study conducted by Levine and Zervos (1998) revealed that both the development of stock markets and the banking system are positively and significantly connected to economic growth and are both reliable forecasters of it. Around the world, a developed and sizable stock market is seen as a sign of a nation's economic strength and future, as well as a measure of the confidence of both local and foreign investors. A number of studies have also shown that there is a strong relationship between the growth of stock markets and economic expansion. Mishra et al. (2011) stretched in their study that the capital market of India works as a potential catalyst to the development of the country. The two components of capital market are stock market and debt market. To explore the magnitude of their effects on Malaysian economy, Nordin and Nordin (2016) found that compared to the debt market, the stock market is proven to have a stronger impact on the Malaysian economy. Moreover, the stock market has been proven to exert uni-directional causality on the economy, unlike the debt market.

Tax is considered a significant instrument for navigating economic and social policies towards achieving economic growth. According to Ihendinihu et al. (2014), economic growth is significantly influenced by overall tax income. They further concluded that tax revenue and economic growth have a long-term equilibrium relationship. To analyze whether reduction of corporate tax increases the economic growth, Ferede and Dahlby (2012) conducted a study, where they found that

slower economic growth and weaker private investment are both correlated with greater corporate income taxes. They further estimated that a reduction in the corporate tax rate of 1 percentage point corresponds to an increase in the yearly growth rate of 0.1 to 0.2 percentage points.

As capital market is a vital part of an economy, policy measures impact the capital market to a great extent. To explore the short and long run effects of fiscal policy on US stock returns, Mbanga and Darrat (2015) found that there is a strong long-run (equilibrium) relation between stock prices with fiscal policy. To understand if any reform in fiscal and taxation systems have any impact on the capital market of China, Jiang et al. (2019) suggested that tax cuts and policy measures are required to stabilize capital markets and to ensure their active and sustainable development. To investigate the role that the capital market and fiscal policy play in influencing economic growth, Attari et al. (2014) discovered that substantial collection of direct tax income and expansion of financial market activity both significantly contribute to Pakistan's economy's growth. The activities of financial market have a significant positive impact on the tax revenue of the country. According to Akram (2016), the number of bank branches and market capitalization have a significant impact on the tax revenue of Pakistan. Similar study regarding whether financial system variables such as stock market development, banking development, banking crisis and financial inclusion showed a crucial role in the tax revenue of Nigeria (Ajide and Bankefa, 2017).

Companies usually come to Initial Public Offering (IPO) to expand their business, with an expectation to increase their profitability. According to a study conducted by Uyên (2011), around 75% of the companies in Vietnam witnessed an increase in Profit Before Tax after IPO.

To understand the statistical significance between the pre- and post- treatment for matched sample, Xu et al. (2017) used the

paired t-test in their study. David et al. (2020) used paired t-test in analyzing if entrepreneurs have considerable positive growth both before and after five years of joining saving and credit associations.

Therefore, to the best of authors' knowledge, no study has been conducted to analyze the impact of companies' listing into stock market on national tax revenue. Thus, the study has addressed this gap and explored the pre- and post-IPO effects on the national tax revenue of Bangladesh.

3. Methodology

The research mainly tried to focus on the tax differentials of the performance by taking into consideration the corporate tax of the companies. The study incorporated the data of the corporate tax before and after listing into the capital market. As showed in research methodology, sixty companies have been selected as inputs to the study. Three pre-listing years' tax data (L-3 to L-1) and five post-listing years' tax data (L+1 to L+5) have been considered for making the decision. Also, a separate section has been complemented to find out the Tax Sales Ratio for the sixty companies before and after listing into the capital market. The study analyzed the sector-wise corporate tax difference on listing event, total tax difference on listing event and finally, the listing-method wise tax difference.

Step 1: Defining the event properly and spectrum of the event

The event is "Date of Getting Listed into DSE". Keeping that time as Time 0, the years ahead of Time 0 will be considered as "Average Tax After Listing" and those before Time 0 will be considered as "Average Tax Before Listing" datasets.

Again, corporate tax paid as percent of sales revenue is another tool of judging the implication of listing into the capital market on tax revenues. Thus, two similar windows of database will be created; "Average Tax to Sales Ratio Before Listing" termed as ATSRBL and "Average Tax to Sales Ratio After Listing" termed as ATSRAL.

Step 2: Selection of companies and data period and Sample Distribution

The study has considered companies that have been listed from 2011 to 2016 so that the research can consider L-3 to L+5 scope of datasets representing a total eight years of study, where L stands for Listing Year.

The research has selected these companies based on the consistency of similar government and policy measures on tax revenues. Fifteen sectors, as per the sectors classification of Dhaka Stock Exchange, have been considered which constitute the 60 companies for this study. The sample distribution is shown below:

Table 1: Sample Distribution of Sectors

Name of Sectors	Number of Companies
Paper & Printing	1
IT Sector	1
Travel & Leisure	2
Telecommunications	1
Engineering	11
Life Insurance	2
Insurance	1
Fuel & Power	5
Services and Real Estate	1
Financial Institutions	2
Textiles	20
Food & Allied	3
Pharmaceuticals and Chemicals	5
Cement	1
Miscellaneous	4
Total	60

Step 3: Data Collection

The data of corporate tax amount and sales revenue is considered the prime information for the research. On identification of any confusion in taxation criteria, total corporate tax is considered as the only subject of interest of this analysis. For collection of tax and sales information, audited financial report is used for post-listing tax data. On the other hand, the pre-listing tax and sales information is collected from prospectus of the companies.

Step 4: Test of Hypothesis

For the overall statistical techniques and their application and interpretation of the study, the following hypothesis hold for the entire study:

H_0 : There exists no relationship between listing into the capital market and tax disbursement to government.

H_1 : There exists relationship between listing into the capital market and tax disbursement to government.

In this step, three statistical techniques that have been used:

Descriptive Statistics: The descriptive statistics help to find out the essential information about the means, standard deviation, minimum and maximum of data set. This information is necessary to know the ranges, volatility levels, and means of the two datasets for two types of paradigms of research.

Paired T-Tests: The paired t-test helps to test the hypothesis whether there exists any significant difference between the means of the datasets before and after the listing. For this t-test, the hypotheses are:

H_0 : There exists no difference between the means of Average Tax Before Listing (ATBL) datasets and Average Tax After Listing (ATAL) datasets.

H_1 : There exists difference between the means of Average Tax Before Listing (ATBL) datasets and Average Tax After Listing (ATAL) datasets.

Again, for understanding the relative percentage

F-Tests: In this study, F-test has been used for checking the hypothesis for finding the existence of any significant difference between the variances of the datasets. If the hypothesis is proved, it can be concluded that there exists a relation between listing into the capital market and tax disbursement to government. The hypotheses are:

H_0 : There exists no difference between the variance of ATBL datasets and ATAL datasets.

H_1 : There exists difference between the variance of ATBL datasets and ATAL datasets.

With 95% confidence interval, all of the datasets for both ATBL datasets and ATAL datasets are to be statistically tested to get to the ultimate decision with holding the hypotheses.

Again, Tax Sales Ratio is the second parameter to judge the relevance of tax with respect to sales for increasing the robustness of the idea behind tax difference on the event of listing into the capital market. Similar to the earlier methodology, the hypotheses are:

H_0 : There exists no difference between the means of Average Tax Sales Ratio Before Listing (ATSRBL) datasets and Average Tax Sales Ratio After Listing (ATSRAL) datasets.

H_1 : There exists difference between the means of Average Tax Sales Ratio Before Listing (ATSRBL) datasets and Average Tax Sales Ratio After Listing (ATSRAL) datasets.

Step 5: Data analysis

In this part, few steps will be done to analyze the study and reach to the hypothesis approval.

Step 1: The total tax disbursed to the government before listing and after listing will be calculated.

Step 2: Sector-wise total corporate tax disbursed to government before listing and after listing will be calculated.

Step 3: Sector-wise total corporate tax growth from before listing to after listing will be calculated.

Step 4: Total government collection growth will be compared with total corporate tax growth after listing for five years.

Step 5: Growth of total tax (year-wise) disbursed to government on the basis of average pre-listing tax disbursement will be calculated.

Step 6: Categorizing the 60 companies into High Cap (Above BDT 1,000 Crore), Mid Cap (BDT 300 to 999 crore), and Low Cap (BDT 10 lacs to 299 crore), the total tax disbursed to government before listing and after listing will be calculated.

After doing this, Phase 2 of hypothesis analysis will be done. The basic big data of average corporate tax before listing and average corporate tax after listing will be summarized.

Step 1: The datasets will be arranged industry-wise.

Step 2: Graphically represent overall average corporate tax before listing and average corporate tax after listing.

Step 3: Graphically represent industry-wise average corporate tax before listing and average corporate tax after listing.

Step 4: Graphically represent the ATBL, ATAL, ATSRBL and ATSRAL as per the Fixed Pricing Method (FPM) and Book Building Method (BBM) to find out which method is

more dominant in disbursing tax revenue to the government.

Step 5: Provide summary statistics to understand the central tendency and dispersion of the average datasets.

Step 6: Generate lognormal values for the average datasets for testing the hypothesis in a better way.

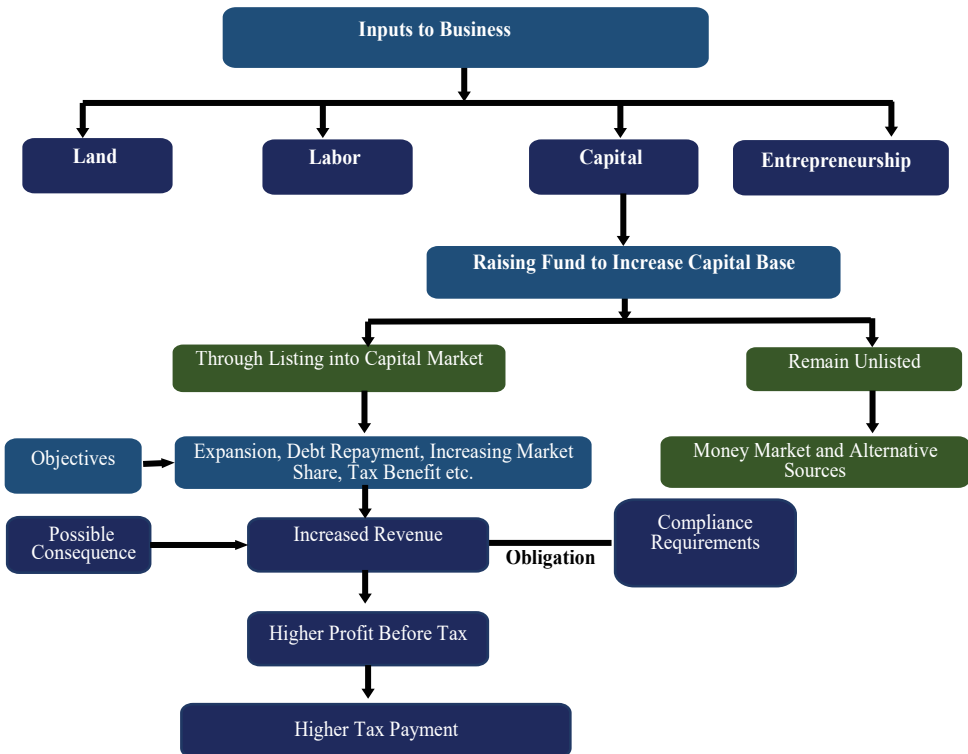
Step 7: Summarize the t-test values to understand the significance at 95% confidence interval.

Step 8: Summarizing the F-test values to understand the difference between the variances at 95% confidence intervals.

This is therefore the brief methodology that will be followed to understand the data and research question.

4. Theoretical Framework from Company’s Perspective

Figure 2: Theoretical Framework of the Study



The concept of identifying the impact of listing into the capital market on national tax revenues in Bangladesh comes with the very initial stage of factors of a business. We know that, a business is a compound of land, labor, capital, and entrepreneurship. When a business wants to run the operation and expand its activities, it must raise fund. And, when a business raises fund, it popularly has different sources to consider. Noticeably, a business can collect fund from own money, friends, relatives, banks, NBFIs, NGOs, alternative financing, and capital market. And, when a business gets listed into the capital market, surely it gets higher potential to be known in public, and expand its operation and scopes. Thus, a business gets higher potentials to profit. And when a business makes bigger profit, under regulations of central authorities, a business contributes to the national corporate tax revenues more than before.

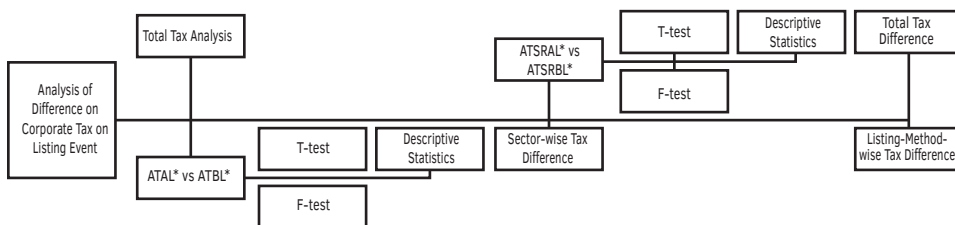
Basically, this is the theoretical framework for the study.

5. Analysis and Findings

This research has mainly tried to focus on the tax differentials of the performance by taking into consideration the corporate tax of the companies. The study incorporated the data of the corporate tax before listing into the capital market and after listing into the capital market. As showed in research methodology, sixty companies have been judged as input to the study. Three pre-listing years' tax data (L-3 to L-1) and five post-listing years' tax data (L+1 to L+5) has been considered for making the decision. Also, a separate study has been done to find out the Tax Sales Ratio for the sixty companies before listing into the capital market and after listing into the capital market. The study analyzed the sector-wise corporate tax difference on listing event, total tax difference on listing event and finally, the listing-method wise tax difference.

5.1 Analysis Tree Diagram:

Figure 3: Analysis Tree Diagram



Note:

- ATAL stands for Average Tax After Listing
- ATBL stands for Average Tax Before Listing
- ATSRAL stands for Average Tax Sales Ratio After Listing
- ATSRBL stands for Average Tax Sales Ratio Before Listing

As discussed earlier, the average tax paid to the government is calculated in two dimensions; one by averaging the pre-listing corporate taxes, and the other by averaging the post-listing corporate taxes. Also, sales revenue has been considered for finding out the exact tax relative to sales considering the listing event which is a different dimension to come to the conclusion about

tax difference on event of listing into the capital market.

5.2 Total Tax Analysis

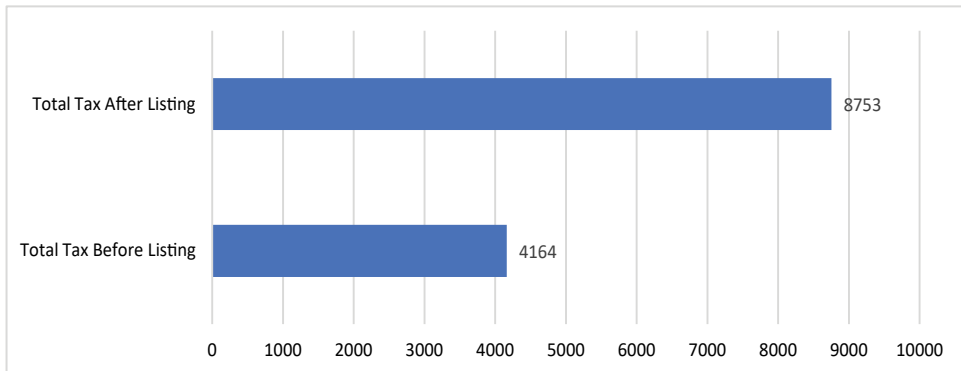
This section will mainly cover few segments of studies that briefly provide some key identification of the analysis and that will help to go to a summary conclusion on a gross perspective.

5.2.1 Total Tax Difference

Considering pre-listed 3 years and post-listed 3 years, this difference can be identified between the two groups; before

listing and after listing. We will see that there exists 110% growth from before listing to after listing.

Figure 4: Total Corporate Tax Disbursed to Government Before and After Listing (BDT in Million)



5.2.2 Sector-wise Total Corporate Tax Before Listing and After Listing

The sector-wise total corporate tax before listing and after listing is shown in the following table:

Name of Sectors	Number of Companies	TTBL	TTAL
Paper & Printing	1	56.5	54.9
IT Sector	1	31.5	32.0
Travel & Leisure	2	245.0	1082.8
Telecommunications	1	41.0	445.9
Engineering	11	1593.5	2537.0
Life Insurance	2	5.7	21.0
Insurance	1	12.6	60.7
Fuel & Power	5	31.0	360.9
Services and Real Estate	1	130.5	241.9
Financial Institutions	2	151.9	227.4
Textiles	20	739.4	1914.9
Food & Allied	3	110.3	216.1
Pharmaceuticals and Chemicals	5	719.4	813.3
Cement	1	199.4	470.7
Miscellaneous	4	96.2	273.2
Total	60		

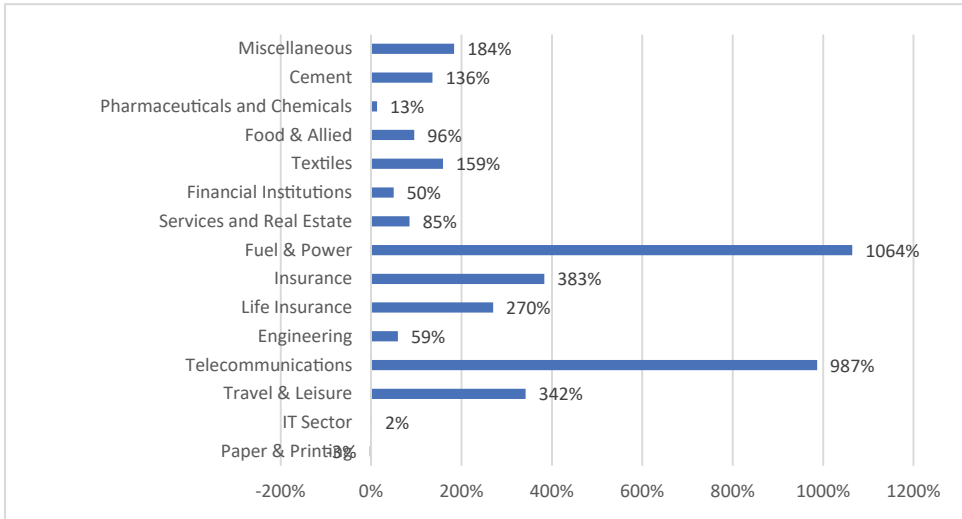
Source: Authors' Calculation

Note: *TTBL stands for Total Tax Before Listing (L-3 to L-1) and *TTAL stands for Total Tax After Listing (L+1 to L+3)

5.2.3 Sector-wise Total Corporate Tax Growth from Before Listing to After Listing

The sector-wise total corporate tax growth from before listing to after listing is shown in the following chart:

Figure 5: Sector-wise Total Corporate Tax Growth from Before Listing to After Listing

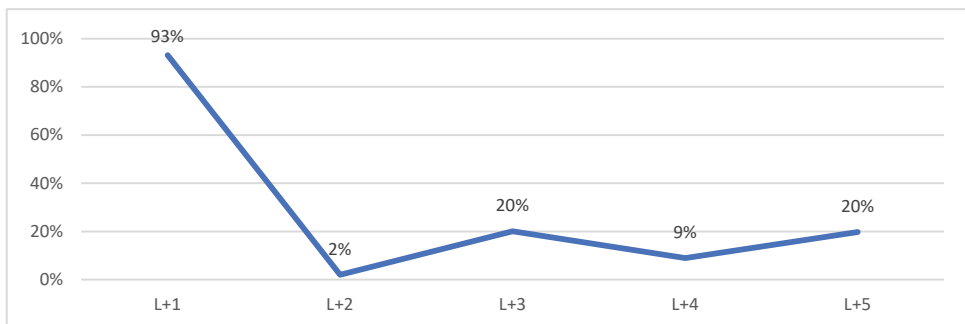


In this figure, except for paper and printing sector, all the other sectors show that growth is massive with respect to corporate tax from before listing to after listing.

5.2.4 Year-wise Growth of Total Tax from Before Listing to After Listing

Considering the average tax before listing as the base data, the year-wise growth of total tax from before listing to after listing has been calculated.

Figure 6: Year-wise Growth of Total Tax from Before Listing to After Listing (with respect to Average Pre-Listing tax)

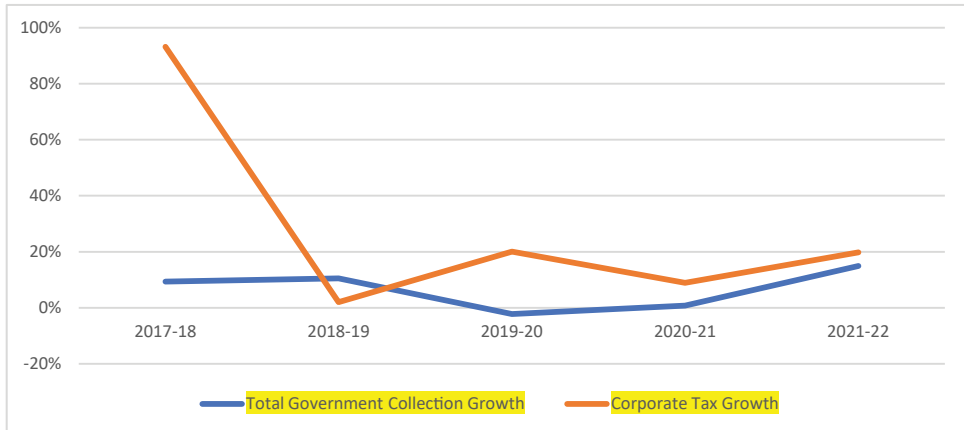


The study shows that the L+1 hit the growth more than 90% from average pre-listed tax disbursement. It decreased in L+2 subsequently keeping a constant growth around 20% in L+5.

5.2.5 Government's Total Collection Growth vs Corporate Tax Growth

In this section, the study will try to discover the essence of corporate tax as one of the contributors of government's total collection sources and represent the growth of year wise corporate tax disbursed to the growth of total collection.

Figure 7: Total Government Collection Growth vs Corporate Tax Growth



It is seen that the growth of after listing corporate tax is much higher than the growth of the collection of the government in each year.

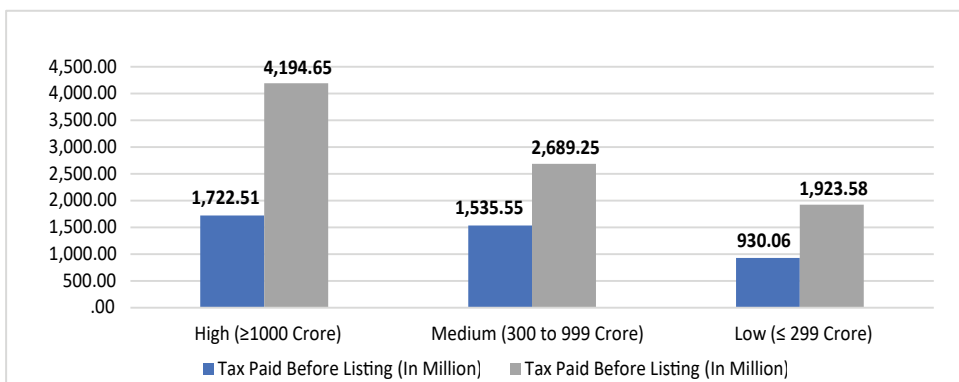
corporate tax difference, it was necessary to know how much tax difference occurs with respect to market capitalization as of today.

5.2.6 Market Capitalization-wise Corporate Tax Difference between Before Listing and After Listing

For the sake of multilateral analysis on finding different impacts and essence of

The study segregated the sample companies into three categories based on their market capitalization. Total tax paid by the companies before three years of listing and after three years of listing has been plotted in the following graph:

Figure 8: Market Capitalization-wise Difference in Corporate Tax Payment between Before Listing and After Listing (BDT in Million)



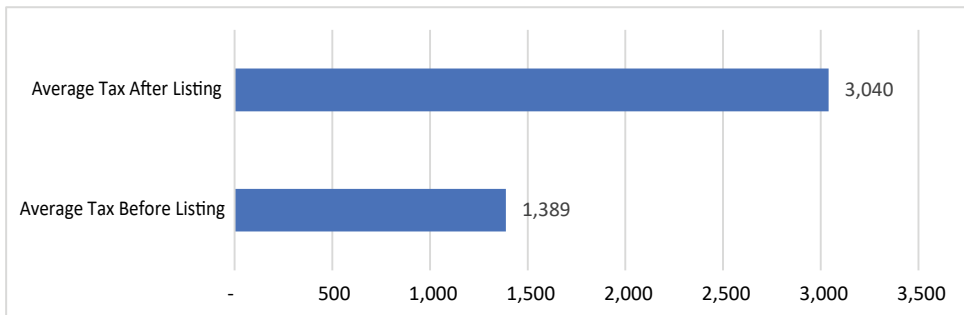
Based on the above graph, high market capitalization companies paid around BDT 4,194.65 million tax after listing into capital market whereas it was BDT 1,722.51 million before listing. Medium market capitalization companies paid around BDT 2,689.25 million after listing against 1,535.55 million before listing. Low market capitalization companies paid around BDT 1,923.58 million after listing against BDT 930.06 million before listing.

Thus, it can be inferred from the graph that High, Mid, and Low market capitalization companies witnessed 143.52%, 75.13% and 106.82% corporate tax growth after listing into capital market.

5.3 Total Corporate Tax Consideration (Irrespective of Sectors)

Irrespective of sectors of Dhaka Stock Exchange, this category of analysis will take into consideration all the companies that were listed between 2011 to 2016. The result shows that Average Total Tax Before Listing is 1,388,537,434 Taka and Average Total Tax After Listing is 3,040,355,269 Taka. Thus, additional tax that the government is getting from the event of listing into the capital market specifically from corporate tax is 1,651,817,834 Taka.

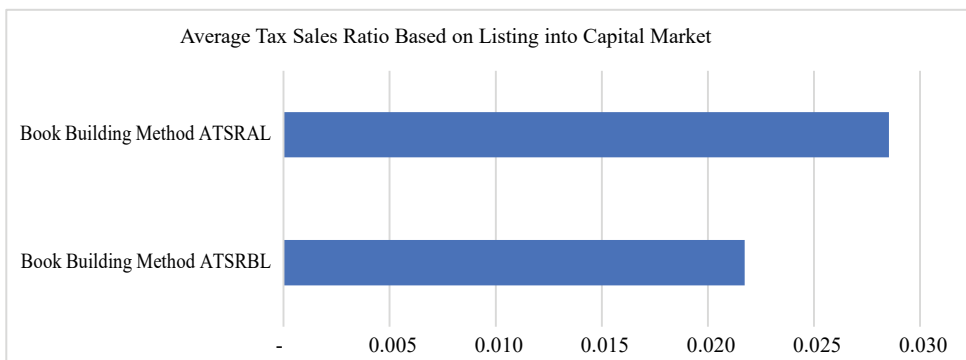
Figure 9: All Industries' Average Tax Disbursement from Listing into Capital Market (BDT in Million)



When Tax Sales Ratio is calculated based on the average of L-3 to L-1 as Average Tax Sales Ratio Before Listing (ATSRBL) and the average of L+1 to L+5 as Average Tax

Sales Ratio After Listing (ATSRAL), the results show that ATSRAL is higher than ATSRBL. The following chart will illustrate the findings:

Figure 10: All Industries' Average Tax Sales Ratio based on Listing into Capital Market



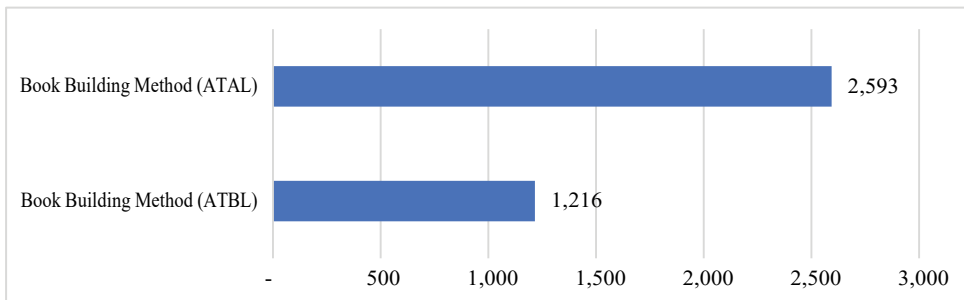
The tax disbursement from all the 60 companies listed from 2011 to 2016 in the capital market of Bangladesh show that after listing into the capital market, the tax flow to national revenue is much higher than the time when the companies were not listed.

5.4 Total Corporate Tax Consideration (Respective to Methods of Listing)

As there are two types of methods for listing into the capital market; one is Book

Building Method and the other is Fixed Pricing Method, the study will try to find out which method of listing into the capital market disburses higher tax amount to the government. It can be evidenced that, in Book Building Method, the average tax before listing disbursed to the government in the form of corporate tax is BDT 1,216.2 million and average tax after listing is BDT 2,593.4 million. Therefore, in Book Building Method, ATAL is higher than ATBL by BDT 1,377.2 million.

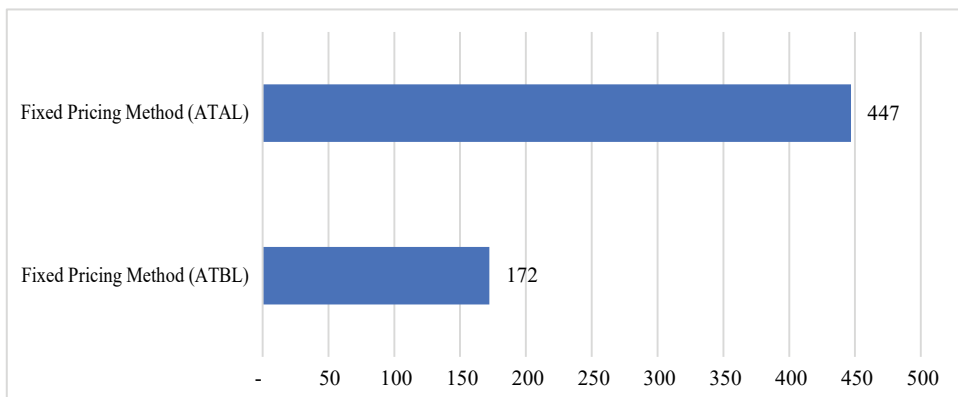
Figure 11: Average Tax Disbursed on Listing in Book Building Method (BDT in million)



When Fixed Pricing Method is applied, the ATBL is BDT 172 million and ATAL is BDT 447 million. Thus, additional tax disbursed

due to listing into the capital market is BDT 275 million.

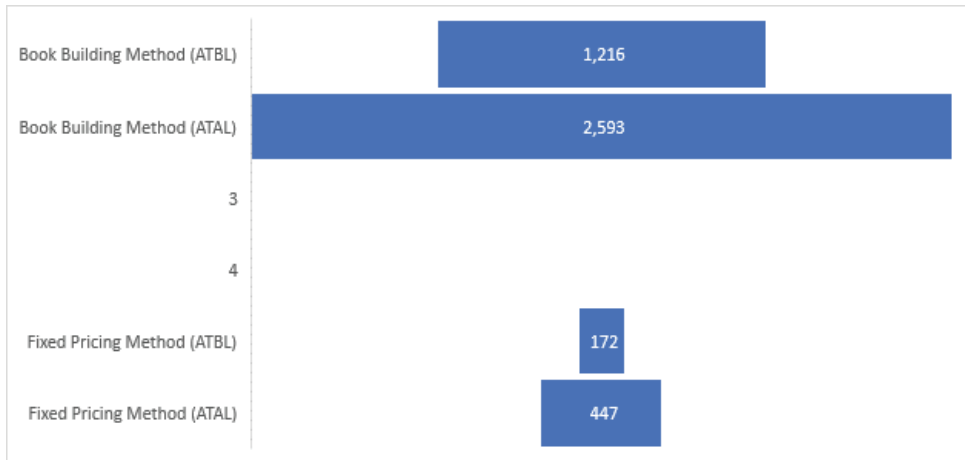
Figure 12: Average Tax Disbursed on Listing in Fixed Pricing Method (BDT in Million)



If the pricing methods are compared between each other, the following bar chart will show the comparative statement on

the profitable method for revenue disbursement perspective to government:

Figure 13: Average Tax Disbursement to Government based on Pricing Strategy (BDT in Million)



The study shows that Book Building Method has been more dominant in contributing higher amount of tax revenue to the government. And in the pricing strategies,

ATAL is always higher than ATBL. While considering the Tax Sales Ratio, the pricing strategies will also react in the following styles:

Figure 14: ATSRBL vs ATSRAL (BBM)

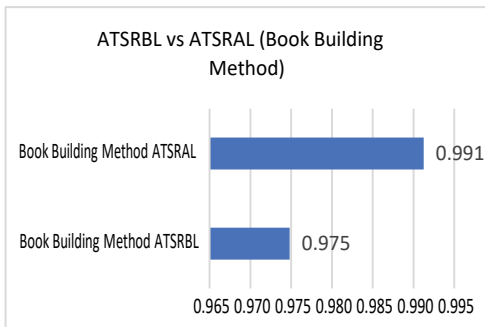
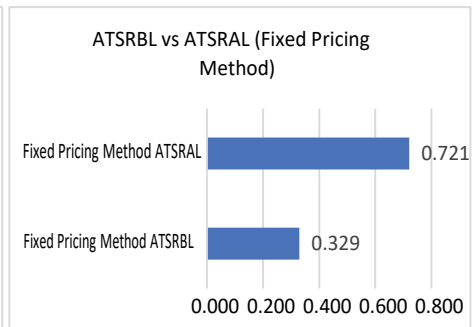


Figure 15: ATSRBL vs ATSRAL (FPM)



So, we see that Fixed Pricing Method is much better in consideration of Tax Sales Ratio for disbursing higher amount of tax revenues to the government.

5.5 Total Corporate Tax Consideration (Respective to Sectors)

With respective to the companies which were listed from 2011 to 2016, sixty companies, on the availability of informa-

tion, were considered in the study which are constituents of different sectors of Dhaka Stock Exchange (DSE). The study tried to know which sector dominated in disbursing corporate tax revenue to the government. The following table will show the corporate tax revenue focusing on different sectors' ATBL and ATAL and ATSRBL and ATSRAL.

Table 3: Sector-wise ATBL, ATAL, ATSRBL and ATSRAL

Name of the Sectors	ATBL	ATAL	ATSRBL	ATSRAL
Paper & Printing	19	11	0.01	0.03
IT	11	9	0.02	0.01
Travel & Leisure	82	297	0.10	0.06
Telecommunications	14	98	0.02	0.13
Engineering	531	1,011	0.01	0.02
Life Insurance	2	79	0.00	0.06
Insurance	4	25	0.09	0.18
Fuel & Power	10	165	0.00	0.01
Services & Real Estate	44	50	0.04	0.02
Financial Institutions	51	123	0.15	0.10
Textiles	246	593	0.01	0.02
Food & Allied	37	66	0.03	0.03
Pharmaceuticals & Chemicals	240	256	0.03	0.03
Cement	66	154	0.03	0.02
Miscellaneous	32	102	0.01	0.01

Source: Authors' Calculation

From the above table, the clear representation of the average tax disbursed to the government in the form of corporate tax

before the listing period and after the listing period will be displayed in the following charts:

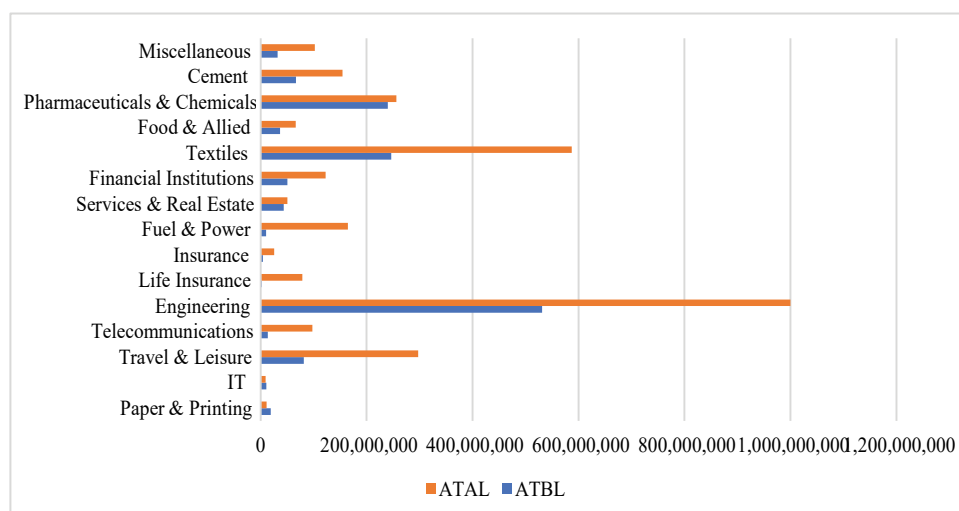
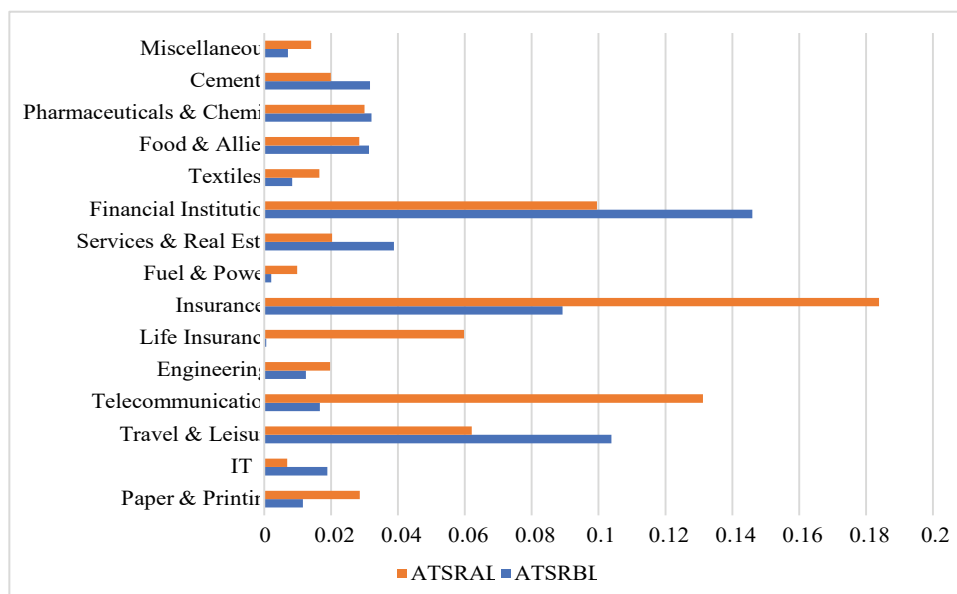
Figure 16: Sector-wise ATBL vs ATAL (In Millions of BDT)

Figure 17: Sector-wise ATSRBL vs ATSRAL



As of the sectors of Dhaka Stock Exchange, this category of analysis considers the corporate taxes of different companies. This part will judge which sector has performed in what level with respect to corporate taxes in L-3 to L+5 spectrum. The study shows that both ATAL and ATSRAL are higher than ATBL and ATSRBL in almost all of the sectors.

5.6 Descriptive Statistics

In this section of analysis, a basic understanding of the datasets will be provided where the companies' tax information and TSR information will be summarized and showed in descriptive statistics.

5.6.1 Descriptive Statistics for ATBL and ATAL (In Millions of BDT)

Table 4: Descriptive Statistics for ATBL and ATAL (In Millions of BDT)

Obs	Mean		Standard Deviation		Minimum		Maximum	
	ATSRBL	ATSRAL	ATSRBL	ATSRAL	ATSRBL	ATSRAL	ATSRBL	ATSRAL
60	0.0217353	0.0317022	0.0428155	0.0422371	0	0	0.2326313	0.1984327

We see that there has been a drastic difference between parameters like Mean, Standard Deviation (SD), Minimum, and Maximum values between the datasets of ATSRBL and ATSRAL representing the possibility of having a significant difference between the datasets.

5.7 Paired t-test for Finding Difference between Means

For finding out whether there exists any significant difference between the means, Paired T-test is performed for the study. With 95% confidence interval, the test shows the following results for the two datasets; one is between ATBL and ATAL and the other is between ATSRBL and ATSRAL

5.7.1 Paired t-test between ATBL and ATAL

For testing the hypothesis, the corporate tax data before listing and after listing were converted to lognormal datasets. Thus, two

datasets named lnATBL and lnATAL were created, upon which, the test was run and the following key outputs were found:

Table 6: Paired t-test between ATBL and ATAL

Variables	Paired t-test	
	t value	Two-tailed p value (95% confidence interval)
lnATBL and lnATAL	-4.6299	0.0000

Source: Authors' Calculation

The result shows that the null hypothesis (H₀) should be rejected. That means, there exists significant difference between the means of ATBL and ATAL. Thus, it can be said that the average corporate tax disbursed to government after listing into the capital market is higher than average corporate tax disbursed to government before listing into the capital market.

5.7.2 Paired t-test between ATSRBL and ATSRAL

For identifying the relative corporate tax disbursed to government to sales revenue, this extension of the study was done. It will increase the robustness of the idea regarding actual tax level that companies are paying before and after listing into the capital market. The two datasets created here are ATSRBL and ATSRAL. For testing the hypothesis, paired t-test was run on these two variables. The result shows the following outcomes:

Table 7: Paired t-test between ATSRBL and ATSRAL

Variables	Paired t-test	
	t value	Two-tailed p value (95% confidence interval)
ATSRBL and ATSRAL	-2.1634	- 0.0346

Source: Authors' Calculation

The result shows that the null hypothesis should be rejected. That means, there exists significant difference between the means of ATSRBL and ATSRAL. Thus, it can be said that the average corporate tax disbursed to government relative to sales revenue after listing into the capital market is higher than average corporate tax disbursed to government relative to sales revenue before listing into the capital market.

5.8 F-test for Finding Difference between Variances

The F-test is used to hypothesize if there is any significant difference between the variances of the datasets. If the hypothesis is proved, it can be concluded that there exists a significant difference between the variances of the ATAL and ATBL datasets. With 95% confidence interval, the following outputs were found:

Table 8: F-test for Finding Difference between Variances

Variables	Variance Ratio Test	
	F value	Two-tailed p value (95% confidence interval)
lnATBL and lnATAL	3.3214	0.0000

Source: Authors' Calculation

Thus, it can be concluded that the null hypothesis is rejected. With 95% confidence interval, the p-value is 0.0000 which strongly accepts the alternative hypothesis of having significant difference between the variance of the datasets.

5.9 Summary of the Findings

5.9.1 Based on Secondary Objectives

1. In the total tax analysis, there exists 110% growth from before listing to after listing. This is a clear indication that the tax disbursement from non-listed companies is much lower than the tax disbursement from the listed companies.
2. Except for paper and printing sector, all the other sectors show that growth is massive with respect to corporate tax from before listing to after listing.
3. The year-wise corporate tax growth basing the average pre-listed corporate tax is much higher over the years.
4. The government's collection growth is lower than the yearly corporate tax collection growth representing its prospect in the future if number of listed companies can be increased.
5. It is also seen that the corporate tax disbursed by the high-market capitalized companies are much higher than mid-market capitalized and low-market capitalized companies

6. In case of ATSRBL and ATSRAL, except for cement, pharmaceuticals & chemicals, food & allied, financial institutions, services & real estate, travel & leisure, and IT sector, other sectors provided higher ATSRAL comparing to respective ATSRBL.
7. Though Book Building Method's tax difference multiple is lower comparing to Fixed Pricing Method (FPM), the net tax disbursed to government is very high in this method comparing to FPM.

5.9.2 Based on Primary Objective

The t-test and F-test showed significant difference between means and variances that rejected the null hypotheses. Thus, we can state that there is a positive and statistically significant impact of listing into capital market on national tax revenues of Bangladesh.

6. Conclusion and Recommendations

A sound financial system is prerequisite for a balanced economy. The Digital Bangladesh is stepping towards a Smart Bangladesh. Thus, the contribution of capital market in accumulating the capital necessary for the continuous development of the country needs no elaboration. Tax plays a vital role in catering to this development of the country. Thus, if the tax rate is favorable, more companies will come into the capital market. This will further boost the tax revenue of the country as the listed

companies need to have a transparent accounting system, necessary for the adequate tax payment. Therefore, this study has been undertaken to explore the tax receipt of national coffers from listed companies in order to make a recommendation to formulate conducive tax policy.

Despite the 7.5 percentage gap between listed and unlisted companies, the total tax, TSR, and average total tax payment from listed companies is larger than those of unlisted companies. In such cases, the following recommendations can be conveyed based on this study:

- The corporate tax paid by the companies after listing is significantly higher than the tax paid when companies were not listed. Thus, to encourage the companies to get listed, an official index of dignitary companies should be evolved. The concept of dignitary companies is like putting an official

value to every company which are listed and having higher market capitalization with respect to governmental support and help when required. In national level crisis moments, operation expenditures may mount up. That time, a company with high index value will get facility from government with priority.

- As listed companies need to publish their audited financial statement and other credentials, this lessens the chance of tax evasion. The study saw that even 20% corporate tax liability required for listed companies proved a higher corporate tax disbursement to government than 27.5% corporate tax liability of non-listed companies. So, a difference of tax liability higher than 7.5% can be considered by the policy makers. Also, the following comparable countries' corporate tax rates can be considered:

Countries	Corporate Tax Rate
India	15%
UK	19%
USA (Federal)	21%
USA (State)	1%–12%
Maldives	15%
Kuwait	15%

So, Bangladesh can also reduce it only for the listed companies.

- It has been observed while communicating with many non-listed and listed companies that compliance relaxation has been another reason for encouraging companies to remain non-listed. Thus, government must strictly monitor whether non-listed companies follow the below basic acts (except for those unrelated to business type):
 - o Companies Act 1994
 - o The Partnership Act, 1932

- o The Societies Registration Act 1860
- o The Trade Organization Ordinance, 1961
- o The Contract Act, 1872
- o The Sale of Goods Act, 1930
- o The Bank Companies Act, 1991
- o The Bankruptcy Act, 1997
- o The Islamic Development Bank Act, 1975
- o The Money Loan Courts Act, 2003
- o The Financial Institutions Act, 1993
- o The Negotiable Instruments Act, 1881

- o The Investment Board Act, 1989
- o The Foreign Private Investment (Promotion & Protection) Act, 1980
- o The Labour Code, 2006
- o The Patents and Designs Act, 1911
- o Trade Marks Act, 2009
- o The Consumer Rights Protection Act, 2009
- o The Imports and Exports (Control) Act, 1950
- o The Patents and Designs Act, 1911
- o Trade Marks Act, 2009
- o The Insurance Act, 2010
- o The insurance Development & Control Authority Act, 2010
- o The Insurance Corporations Act, 1973
- o Income Tax Ordinance 1984
- Submission of a separate audit report should be made compulsory to the non-listed companies like the listed companies. This will encourage the transparency of the compliance of the necessary laws related to the sustaining and following of basic laws to run business in the country and social betterment. This will minimize the gap that the non-listed companies find in compliance issues between a listed and non-listed company.
- In case of running Public-Private-Partnership projects with joint ventures, it can be an order from the government that companies must be listed into the capital market.
- As of the SDG goals and government's most Fastrack plans, companies in relevant industries can be relaxed from tax burdens for few years after listing as per their priority
- It can be mandated to issue equity for companies which are unicorn companies in Bangladesh. Also, considering asset size and liability portion of annual reports of non-listed companies, those who have high debt ratio with centralized sources should be monitored and incentivized for issuing equity in capital market.
- It has been seen that Environmental, Social and Governance (ESG) compliance is significantly lower in non-listed companies, which is found in the outcome of oral interviews of the non-listed companies' representatives. So, when ESG will be mandated to be followed by every company, they will find no difference in being unlisted or getting listed into the capital market.

References

- Adekunle, O. A., Salami, G. O., & Oluseyi, A. A. (2013). Impact of financial sector development on the Nigerian Economic Growth. *American Journal of Business and Management*, 2(4), 347-356. <http://www.worldscholars.org/index.php/ajbm/article/view/361>
- Ajide, F. M., & Bankefa, O. I. (2017). Does financial system influence tax revenue? The case of Nigeria. *African Journal of Economic Review*, 5(3). Retrieved February 2, 2023, from <https://ideas.repec.org/a/ags/afjecr/302982.html>
- Akram, N. (2016). Do financial sector activities affect tax revenue in Pakistan? *The Lahore Journal of Economics*, 21(2), 153-169. <https://doi.org/10.35536/lje.2016.v21.i2.a6>
- Atje, R., & Jovanovic, B. (1993). Stock markets and development. *European Economic Review*, 37(2-3), 632-640. [https://doi.org/10.1016/0014-2921\(93\)90053-d](https://doi.org/10.1016/0014-2921(93)90053-d)
- Attari, M. I. J., Taha, R., & Farooq, M. I. (2014). Tax revenue, stock market and economic growth of Pakistan. *Acta Universitatis Danubius. Economica*, 10(5). Retrieved March 15, 2023, from <https://www.cceol.com/search/article-detail?id=572026>

- CEIC. (n.d.). Bangladesh Dhaka Stock Exchange: Number of listed companies and shares. CEIC. Retrieved February 15, 2023, from <https://www.ceicdata.com/en/bangladesh/dhaka-stock-exchange-number-of-listed-companies-and-shares>
- David, I., Adubisi, O., Farouk, B., & Adehi, M. (2020). Assessing MSMES growth through ROSCA involvement using paired T-test and one sample proportion test. *Journal of Social and Economic Statistics*, 9(2), 30–42. <https://doi.org/10.2478/jses-2020-0011>
- Ferede, E., & Dahlby, B. (2012). The impact of tax cuts on economic growth: Evidence from the Canadian provinces. *National Tax Journal*, 65(3), 563–594. Retrieved from <https://doi.org/10.17310/ntj.2012.3.03>
- Habib, A. (2022, August 21). Stocks tax policy scares off long-term investors Analysts say. The Daily Star. Retrieved from <https://www.thedailystar.net/business/economy/industries/tax-customes/news/stocks-tax-policy-scares-long-term-investors-3099511>.
- Thendinihu, J. U., Jones, E., & AmapsIbanichuka, E. (2014). Assessment of the long-run equilibrium relationship between tax revenue and economic growth in Nigeria: 1986 to 2012. *The SIJ Transactions on Advances in Space Research & Earth Exploration*, 2(5), 1–9. <https://doi.org/10.9756/sijasree/v2i5/0202120102>
- Jiang, C., Na, S., & Jiang, F. (2019). Influencing efficiency of tax relief on the Capital Market: An empirical study of China supply-side reform. *Sustainability*, 11(11), 3012. <https://doi.org/10.3390/su11113012>
- Levine, R., & Zervos, S. (1998). Stock Markets, Banks, and Economic Growth. *The American Economic Review*, 88(3), 537–558. <http://www.jstor.org/stable/116848>
- Mbanga, C. L., & Darrat, A. F. (2015). Fiscal policy and the US Stock Market. *Review of Quantitative Finance and Accounting*, 47(4), 987–1002. <https://doi.org/10.1007/s11156-015-0528-y>
- Mishra, P. K., Mishra, U. S., Mishra, B. R., & Mishra, P. (2011). Capital Market Efficiency and Economic Growth: The Case of India. *European Journal of Economics, Finance and Administrative Sciences*, 27(27), 130–138.
- New Age. (2022, October 26). NBR must be stringent against non-complying companies. New Age BD. Retrieved November 30, 2022, from <https://www.newagebd.net/article/184671/nbr-must-be-stringent-against-non-complying-companies>.
- Nordin, S., & Nordin, N. (2016). The Impact of Capital Market on Economic Growth: A Malaysian Outlook. *International Journal of Economics and Financial Issues*, 6 (7), 259–265. Retrieved from <https://dergipark.org.tr/en/pub/ijefi/issue/32000/353069?publisher=http-www-cag-edu-tr-ilhan-ozturk>
- Office of the Registrar of Joint Stock Companies and Firms. (n.d.). Retrieved March 18, 2023, from <http://roc.gov.bd/site/page/2f14b592-33c7-4931-b276-e16b0a9ded0d/->
- Rahman, M. F. (2022, April 24). Registration of new companies slows. *The Daily Star*. <https://www.thedailystar.net/business/economy/news/registration-new-companies-slows-3077781>.
- Star Business Report. (2023, March 2). Reduced corporate tax rates yield no benefits. *The Daily Star*. <https://www.thedailystar.net/business/economy/news/reduced-corporate-tax-rates-yield-no-benefits-3261041>.
- Tax Justice Network. (2021). Bangladesh. *Tax Justice Network*. Retrieved March 4, 2023, from <https://taxjustice.net/country-profiles/bangladesh/>
- TBS Report. (2022, June 9). Tax cuts for corporates. *The Business Standard*. Retrieved October 18, 2022, from <https://www.tbsnews.net/economy/budget/tax-cuts-corporates-436378>.
- Uyên, T. T. (2011). The impact of Initial Public Offering on profit before tax on asset in Vietnamese enterprises – from the perspective of Management Accounting. *Journal of Economic Development*, No. 24, 50–57. Retrieved February 6, 2023, from http://www.jabes.ueh.edu.vn/Home/SearchArticle?article_Id=e06085c3-8a39-4017-a8ba-2feb61878a83
- Xu, M., Fralick, D., Zheng, J. Z., Wang, B., Tu, X. M., & Feng, C. (2017, June 25). The differences and similarities between two-sample t-test and paired t-test. *Shanghai Archives of Psychiatry*, 29(3), 184–188. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5579465/>

Appendix 7.1: Corporate Tax Information

Company Names	Listing Year	Section Before			Section After				
		L-3	L-2	L-1	L+1	L+2	L+3	L+4	L+5
Rangpur Dairy & Food Products Ltd.	2011	0	0	5000	3142105	3278252	5983955	7225792	5064513
Zahintex Ind. Ltd.	2011	0	2883612	5421924	16859000	16318000	10878000	19023000	13315000
Bangladesh Shipping Corporation (RP)	2011	0	0	3170316	8886995	14609942	25175725	24006064	31994661
GBB Power Ltd.	2011	0	0	1100423	12177220	19774370	12236585	8402844	
GSP Finance Co. BD Ltd.	2011	12810773	19936977	55954412	73814410	65873374	85807849	133088949	202764461
Padma Islami Life Ins. Co. Ltd.	2012	1167766	1745951	2235296	0	138000	15510000	157290988	154496941
GPH Ispat Ltd.	2012	972389	1180298	16376503	46283045	89422793	89002983	88022624	179191873
Saiham Cotton mills Ltd.	2012	0	0	2297546	60903703	45864184	28429386	29855749	16691065
Bangladesh Sub-marine Cable Co. Ltd.	2012	0	2034024	39000000	112000000	215497909	118394089	29172487	13160000
Unique Hotel & Resorts Ltd.	2011	0	0	0	228401695	319454913	386157738	249949878	129992259
Aamra Technologies Ltd.	2012	10594982	9426566	11482394	11252495	8624128	12161119	7255997	6868096
Envoy Textiles Ltd.	2012	0	0	130490	14477364	4261934	18552604	35092548	45356147
Generation next Fabrics Ltd.	2012	8491050	19269786	36093138	19897460	24772268	26033710	30152828	29106971
Sunlife Insurance Co. Ltd.	2012	0	402054	121970	11527	1636018	3692992	27372997	33904568
Premier Cement Mills Ltd.	2012	22689895	108718106	68040042	262370000	185670000	22630000	201430000	100380000
Global Heavy Chemicals Ltd.	2012	5499281	15320946	84100566	8660000	14230000	3370000	3590000	10910000
Summit Purbanchal Power Co. Ltd.	2011	0	0	0	33201636	0	0	0	0
Orion Pharma Ltd.	2012	145000000	145560000	311866367	164560000	153220000	270790000	165080000	151870000
Bengal Windsor Thermo-plastics Ltd.	2012	0	0	0	8905500	8447500	7826200	7415200	6458787
Golden harvest Agro Ind. Ltd.	2012	3400000	34800000	72080781	62568386	52940106	40118973	49273139	52892950
Argon Denims Ltd.	2012	0	0	0	58582481	65995468	58680441	54606724	47228446
Familytex BD Ltd.	2012	0	0	0	0	0	3915565	6572713	2458418
Central Pharmaceuticals Ltd.	2013	1640325	4575814	5675257	55617508	60816453	56317638	33275092	36524293
Fareast Finance & Inv. Ltd.	2012	8500000	35500000	19161479	0	976968	958018	4074028	557840
Bangladesh Building Systems Ltd.	2013	7729053	1191488	13467336	50933854	87791874	85449285	118447321	81079998
MozaffarHossain Spinning Mills Ltd.	2013	3309391	6816176	2339751	7202719	25321534	31623993	28468133	28598528
Paramount Textile Ltd.	2013	0	12731890	15897854	45351559	27065475	34964496	37514813	51197459
Appollo Ispat Complex Ltd.	2013	60692348	156166013	192293751	165612630	86590490	160076486	131647210	38367816
AFC Agro-biotech Ltd.	2013	0	0	210637	3521915	28527	22176103	31942009	34720218
Matin Spinning Mills Ltd.	2014	41186608	40719480	50920337	92695210	103865080	44378383	12707554	31721291
Emerald oil Ind. Ltd.	2014	0	28450	22501	22027262	26022945	0	0	0
Far Chemical Ind. Ltd.	2014	0	0	0	0	0	0	0	0
Khulna Printing & Packaging Ltd.	2014	18106903	17463219	20968658	35000000	16097296	3846600	8771	
Hwa well Textiles Ltd.	2014	16807299	20226834	28047923	36191845	24884595	24974347	29189693	32773098
Shahi Bazar Power Co. Ltd.	2014	6637204	8181350	7001168	78867258	111137393	26930717	107959911	248441414
Tung hai Knitting & Dyeing Ltd.	2014	13575826	26186236	11163771	9849822	18458919	7770750	4508123	704307
Shurwid Industries Ltd.	2014	4023276	1224135	10433603	354159	317995	4237176	5924583	2695750
Saif Power tech Ltd.	2014	39534695	37950054	53052684	43040180	62950164	135946397	424991	9781109
Far east Knitting & Dying Ltd.	2014	8846686	14505218	19365964	28715887	91353231	96765753	38993911	27292045
Ratanpur Steel Re-rolling Mills Ltd.	2014	19856849	131762418	39896283	54871379	3158212	83227883	222518512	233893481
Western Marine Shipyard Ltd.	2014	0	0	0	12519474	5502343	12384074	16023113	23765264
Khan Brother PP Woven Bag Ind. Ltd.	2014	5910173	11277559	20244566	15736099	11022574	15110000	4110749	3825786
The peninsula Ctg. Ltd.	2014	72619018	82531685	89884550	58397450	51919104	38428961	10299871	13667552
C&A Textiles Ltd.	2014	7350175	12245436	8785360	12000000	16000000	12000000	17000000	15000000
Hamid Fabrics Ltd.	2014	1731219	15744250	21199106	35565660	23680832	15709829	13041678	32504583
Ifad Autos Ltd.	2014	129847651	129470777	129888065	267488226	166641545	255467806	345374728	492872719
National Feed Ltd.	2014	3214910	4956941	3777202	2428730	16084816	14012678	13188930	7351356
Zaheen Spinning Ltd.	2015	2853658	1426829	7311001	9909000	11574391	18932240	13927966	5612768
United Power Generation & Distribut	2013	0	771543	84500	12094683	45820721	2642794	103171759	26040669
Shasha Denims Ltd.	2014	19976371	30877871	43533305	60326026	149071757	99000000	66376274	74320876
Bangladesh Steel Re-rolling Mills Ltd.	2014	256237264	188224809	12427441	31995903	65058305	588650000	167710168	352186805
Toshrafa Inds. Ltd.	2014	4594067	13800007	9555876	21502317	39469877	36869533	23716089	10361702
Olympic Accessories Ltd.	2015	6274745	9616861	10832078	11039200	4796232	2965383	2659512	4020049
Aman Feed Ltd.	2015	20560276	15746646	7332571.0	772474	71747436	70584764	74421147	75289691
Bangladesh National Insurance Co. L	2014	1232158	4556636	6774333	19960592	18601404	21237112	29290107	36746213
Simtex Indus. Ltd.	2015	15074564	14762987	30956426	15669852	25533139	21549330	27493807	12074881
KDS Accessories Ltd.	2014	21595862	25408380	16372723	31998473	27838737	20137973	18154988	24586468
Regent Textile Mills Ltd.	2015	10760418	13783589	25525958	16084240	18460353	13359965	27624316	9399509
Dragon Sweater & Spinning Ltd.	2015	2102606	6923195	11281790	3928488	5698251	7152994	9218605	10274346
Doreen Power Generation & Systems	2016	6455937	275374	492028	3897606	776663	1387904	431757	3643390

Appendix 7.2: Corporate Sales Information

Company Names	Method	L-3 Revenue	L-2 Revenue	L-1 Revenue	L+1 Revenue	L+2 Revenue	L+3 Revenue	L+4 Revenue	L+5 Revenue
Rangpur Dairy & Food Products Ltd.	B		91,380,990	97,503,905	693,232,596	719,870,909	532,430,924	563,745,175	607,572,895
Zahintex Ind. Ltd.	B	1,153,444,646	1,355,481,103	2,103,140,000	2,024,552,000	1,785,060,000	1,549,752,000	1,627,261,000	
Bangladesh Shipping Corporation (RPO)	B	2,635,689,526	2,308,989,367	842,908,382	697,166,478	821,513,147	831,874,605	1,850,900,519	
GBB Power Ltd.	B	355,225,483	434,418,786	668,703,207	579,797,279	668,703,207	676,964,223		
GSP Finance Co. BD Ltd.	B	77,096,031	159,981,215	137,444,047	363,099,835	433,132,146	559,934,056	629,990,628	744,674,276
Padma Islami Life Ins. Co. Ltd.	F	1,187,866,102	1,617,449,291	1,791,833,731		1,084,570,000	578,630,000	659,970,000	488,340,000
GPB Ispat Ltd.	B	1,277,035,276	3,223,787,065	3,688,519,184	4,386,316,699	5,387,428,105	4,687,216,381	5,988,396,529	6,967,759,917
Saiham Cotton mills Ltd.	B	1,280,838,507	1,909,861,303	1,982,361,601	1,880,671,804	2,726,083,474	2,989,827,171	2,929,785,600	
Bangladesh Sub-marine Cable Co. Ltd.	B	603,372,651	837,786,048	1,224,306,499	753,744,790	540,683,784	618,644,457	1,036,725,252	
Unique Hotel & Resorts Ltd.	B	552,608,363	734,515,422	21,993,282,955	22,751,562,317	25,589,347,470	28,015,595,924	30,338,072,992	
Amara Technologies Ltd.	B	512,566,960	690,846,042	512,566,960	1,171,444,050	1,142,997,243	1,364,959,607	1,615,505,874	1,724,851,424
Envoy Textiles Ltd.	B	1,912,708,265	3,345,676,799	4,391,171,642	5,479,121,542	4,753,778,825	7,558,432,416	9,118,517,693	
Generation next Fashions Ltd.	F	1,014,538,165	1,289,543,519	1,393,627,887	2,133,758,830	2,605,271,479	3,000,352,440	3,279,614,648	4,023,783,905
Sunlife Insurance Co. Ltd.	F	1,471,396,900	1,515,400,057	586,272,030	4,450,050,066	4,796,404,996	5,298,044,311	4,420,229,794	3,946,932,474
Premier Cement Mills Ltd.	B	1,364,803,864	1,862,271,084	3,428,083,698	6,416,662,323	7,539,574,982	8,098,701,152	9,361,935,844	10,332,898,832
Global Heavy Chemicals Ltd.	B	465,504,247	530,079,053	728,431,825	538,380,000	562,130,000	5,476,700,000	553,650,000	579,150,000
Summit Purbanchal Power Co. Ltd.	B	1,141,751,963	1,412,002,352	1,145,014,718	5,892,627,264	6,191,915,486	6,109,044,517	6,244,859,180	6,420,608,109
Orion Pharma Ltd.	B	1,412,002,352	7,026,328,683	14,799,743,435	9,534,345,195	10,423,101,099	8,705,172,867	7,647,703,031	
Bengal Windsor Thermo-plastics Ltd.	B	606,091,768	638,887,995	879,809,638	896,714,309	854,448,290	923,749,434	904,792,492	
Golden harvest Agro Ind. Ltd.	B	61,611,094	387,783,620	526,526,457	558,666,376	625,680,209	656,624,665	776,658,989	1,427,568,390
Argon Denims Ltd.	B	1,012,885,352	1,178,686,714	2,171,290,000	2,521,270,000	4,077,120,000	2,847,720,000	3,381,450,000	
Familytex BD Ltd.	F	9,347,512,127	1,006,879,167	4,968,690,310	3,264,130,315	1,305,188,432	1,095,452,138	983,367,248	
Central Pharmaceuticals Ltd.	F	79,200,000	146,635,571	254,566,477	654,288,520	600,793,414	416,734,089	455,678,564	319,578,450
Foreast Finance & Inv. Ltd.	F	124,527,221	435,045,891	678,445,423	1,326,146,537	1,046,426,417	881,368,401	1,254,276,584	769,935,810
Bangladesh Building Systems Ltd.	F	1,166,336,469	848,686,058	1,154,305,498	1,850,097,703	1,630,744,700	875,876,708	939,042,262	1,630,744,700
MozaffarHossain Spinning Mills Ltd.	F	638,921,387	738,494,616	390,042,096	674,569,340	352,279,010	283,548,166	1,562,896,323	675,000,000
Paramount Textile Ltd.	B	2,201,136,560	2,849,711,651	2,893,056,085	2,935,282,617	3,018,249,952	3,351,654,004	4,119,598,956	
Appollo Ispat Complex Ltd.	B	4,701,086,562	4,820,320,983	4,998,531,483	5,136,930,830	5,306,374,138	5,714,343,956	3,863,827,323	3,864,000,000
AFC Agro-biotech Ltd.	F	169,924,477	599,617,852	864,155,813	992,501,929	1,035,593,945	1,091,567,738		
Matin Spinning Mills Ltd.	B	2,458,002,913	2,623,615,416	2,395,782,610	2,023,663,281	2,005,184,987	3,001,195,559	4,050,914,298	3,904,153,460
Emerald oil Ind. Ltd.	F	1,098,892,170	1,263,780,691	1,763,368,794	1,849,603,316				
Far Chemical Ind. Ltd.	F	689,265,894	1,097,422,650	1,308,365,030	1,492,738,046	1,436,569,686	1,337,366,121	1,186,680,670	
Khulna Printing & Packaging Ltd.	F	1,186,261,728	2,077,665,763	1,910,212,690	313,122,186	1,080,613,612	520,771,106	1,000,000	
Hwa well Textiles Ltd.	F	1,531,827,691	1,477,645,132	1,795,238,748	1,337,888,116	1,269,701,080	1,210,369,320	1,361,799,432	1,225,957,206
Shajee Bazar Power Co. Ltd.	B	1,422,053,369	1,367,020,938	1,389,008,008	9,182,109,019	7,994,314,013	8,642,556,150	7,385,000,000	7,140,000,000
Tung hai Knitting & Dyeing Ltd.	F	1,019,635,079	997,743,832	1,015,452,967	912,174,309	731,259,239	107,627,944	107,874,934	101,545,296
Shurwid Industries Ltd.	F	189,738,222	202,306,005	229,904,457	118,052,943	105,998,275	152,986,875	214,744,983	112,054,845
Saif Power tech Ltd.	B	970,688,918	961,955,180	1,461,512,737	1,757,076,090	2,149,180,726	3,008,061,300	4,238,879,267	3,968,863,398
Far east Knitting & Dyeing Ltd.	B	2,080,561,905	2,358,795,325	2,316,680,977	2,760,228,469	3,139,465,706	3,275,288,788	3,596,097,625	4,784,730,787
Ratanpur Steel Re-rolling Mills Ltd.	B	3,971,094,640	5,936,058,395	5,253,806,261	5,503,171,247	5,377,411,796	7,488,695,752	7,659,678,631	6,808,684,500
Western Marine Shipyard Ltd.	B	3,664,035,818	3,672,274,078	2,441,103,180	2,551,851,870	2,813,975,718	2,978,544,328	3,024,284,044	3,129,867,730
Khan Brother PP Woven Bag Ind. Ltd.	F	450,625,128	530,754,633	916,879,628	1,142,896,239	779,184,305	739,027,917	579,366,749	239,352,526
The peninsula Ctg. Ltd.	B	355,156,655	402,928,882	420,264,263	343,075,646	300,264,617	268,789,109	264,285,245	316,142,601
C&A Textiles Ltd.	F	994,521,908	826,273,358	1,145,628,742	2,775,756,460	2,283,545,840	2,284,000,000	1,653,000,000	1,205,000,000
Hamid Fabrics Ltd.	B	1,696,890,801	1,391,252,956	2,120,482,277	1,782,564,422	1,371,915,641	1,322,686,460	2,335,482,932	1,969,434,335
Ifad Autos Ltd.	F	4,981,510,692	4,152,476,029	4,306,384,984	5,057,046,311	6,932,578,110	10,239,393,588	15,004,634,671	11,017,369,561
National Feed Ltd.	F	1,475,329,946	1,490,021,503	1,530,273,880	783,939,548	1,466,437,187	1,501,338,757	1,197,947,998	777,619,583
Zaheen Spinning Ltd.	F	399,719,712	455,707,340	439,645,854	444,671,611	699,537,197	674,878,664	800,439,920	608,583,834
United Power Generation & Distribution Ltd.	B	1,778,491,868	2,227,633,409	3,273,488,057	4,463,323,168	3,953,684,761	3,953,684,761	5,759,239,628	11,305,488,436
Shasha Denims Ltd.	B	2,255,548,059	3,735,256,633	3,824,190,283	5,145,000,000	3,038,000,000	6,256,605,210	7,511,254,092	7,922,782,132
Bangladesh Steel Re-rolling Mills Ltd.	B	12,664,400,034	14,043,421,488	8,602,415,008	7,801,976,682	9,713,862,363	23,648,933,383	33,238,371,404	44,408,886,970
Toshirifa Inds. Ltd.	B	677,927,921	799,461,419	941,669,480	1,537,038,272	1,424,008,994	1,206,899,302	1,251,310,829	1,958,490,185
Olympic Accessories Ltd.	F	1,071,662,481	1,231,471,004	1,403,179,268	1,465,000,000	1,357,000,000	1,104,000,000	431,405,903	456,788,926
Aman Feed Ltd.	B	2,032,447,735	2,536,309,939	2,641,647,263	3,654,092,037	4,053,598,905	5,280,184,252	6,216,861,396	6,502,031,547
Bangladesh National Insurance Co. Ltd.	F	26,080,034	48,795,999	53,316,177	114,338,593	155,366,685	176,348,971	180,910,897	108,835,328
Simtex Indus. Ltd.	B	981,122,530	1,131,544,681	1,359,191,916	1,380,435,126	1,381,538,367	1,402,761,909	1,448,580,502	1,190,877,276
KDS Accessories Ltd.	B	1,146,104,981	1,510,377,275	1,647,256,363	1,585,937,175	2,070,885,808	2,302,159,637	1,922,326,909	2,217,942,652
Rentex Textile Mills Ltd.	B	1,348,903,633	1,722,567,233	1,656,465,005	1,656,465,005	2,004,431,936	1,215,257,968	1,454,002,554	861,189,770
Dragon Sweater & Spinning Ltd.	F	689,434,887	758,931,300	766,817,162	833,683,281	1,015,339,175	1,687,646,647	1,921,774,538	1,761,705,743
Doreen Power Generation & Systems Ltd.	B	1,041,291,215	1,049,028,427	1,082,372,595	1,189,840,000	5,150,750,000	6,660,500,000	7,021,680,000	4,746,320,000

