

The Performance of Banking System: A Study on Some Selected Commercial Banks

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Abstract

The banking sector is playing very vital role for the progress of economy of Bangladesh. Although banks create no new wealth but their borrowing, lending, and related activities facilitate the process of production, distribution, exchange and consumption of wealth. In this way they become very effective partners in the process of economic development. This paper examines mainly the financial performance of some selected private commercial banks of Bangladesh. This study is mainly based on secondary sources. For analyzing and comparing data various ratio analysis; like – ROE, ROI, ROA, EMR and PMR. Least Square Method was used for financial trend analysis of banks. It is observed from the study that the net income of the selected private commercial banks have increased from the previous year during 2005 to 2009. It is also reflected from the analysis that the EPS of all the selected commercial banks are very high during 2005 to 2009.

Key Words: Banking Sector, Financial Performance, Ratio Analysis, Least Square Method

Background of the Study

Bank acts as the heart of economic structure of a country and ensures sufficient capital supply for the progress of economy of the country. It is now considered as an essential part of our economic system. It promotes savings and investment and ensures smoother foreign trade. In our country, banking system is very important for sound economy for two reasons, as – it provides a major source of financial intermediation and its checkable deposit liabilities represents the bulk of nation's money stock. Evaluation the overall performance of banks in Bangladesh is very important to depositors, owners, potential investors, managers and, of course, regulators. Currently, financial ratios are often used to measure the overall financial soundness of a bank and the quality of its management. Often a number of criteria such as profits, liquidity, asset quality, attitude toward risk, and management strategies must be considered to measure the financial performance of institutions. This paper analyzes the comparative financial performance of some selected private commercial banks.

Objectives of the Study

In light of the background of the study, the following are the objectives of the study:

- To analyze financial performance of some selected private commercial banks.
- To present the competitive scenarios of some selected commercial banks.
- To analyze the banks performance in some key areas.
- To recommend suggestions for the successful operations of the Banks.

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Methodology of the Study

All the relevant data of this study have been collected mainly from the secondary sources i.e. annual reports of the selected banks, publications of banks, resume of the activities of the financial institutions in Bangladesh, Statistical Yearbook and special bulletin of the selected banks during 2005 – 2009. As a sample of the study five commercial banks – Bank Asia Ltd, Basic Bank Ltd, Eastern Bank Ltd, Prime Bank Ltd and Southeast Bank Ltd are selected for the study. Collected data has been systematically processed and analyzed by using required tools. For analyzing and comparing data, various ratio analyses, like – Return on Equity (ROE), Return on Investment (ROI), Return on Asset (ROA), Equity Multiplier ratio, Profit Margin ratio etc are used. Growth percentage, trend equation, and square of correlation coefficient have been used for statistical analysis. The researchers used least square method

for financial trend analysis of banks. Which is represented by the equation $Y_c = a + bx$ (Chowdhury and Ahmed, 2009), where, Y_c denotes the trend values to distinguish them from the actual Y values. 'a' is the Y intercept or the value of the Y variable when $X = 0$. 'b' represents the slope of the line of the amount of change in Y variable that if associated with a change of one unit in X variable. 'X' variable in time series analysis represents time. The square of correlation coefficient (r^2) is called the multiple determinations or squared multiple correlation coefficients. The coefficient of correlation is denoted by r . The value of r lies between 0 and 1. The higher the r^2 the greater the percentage of the variation of Y explained by the regression model, that is, the better the "goodness of fit" of the regression model to the sample observations. r^2 closer to zero, the worse the fit. (Chowdhury & Ahmed 2009). The formula is used for analysis is $R^2 = (r)^2$; where Correlation (r) = $\frac{\sum(x-\bar{x})(y-\bar{y})}{\sqrt{\sum(x-\bar{x})^2 \sum(y-\bar{y})^2}}$.

Literature Review

Bank is a financial institution, which deals with money and credit. There have a verities number of study took place in respect of performance evaluation of Bangladeshi commercial Bank. It has been investigated the efficiency of commercial banks in Bangladesh using DEA (Data development analysis) with an income-based model and a model on user's costs framework and the results shows that on average, the overall technical efficiency of Bangladesh commercial banks is 67 percent, which is below the average estimated by international studies reviewed by Berger and Humphrey (1997). According to Allen (1997), banks tend to focus on areas where they believe they have a comparative advantage to maximize efficiency in making loans. This approach makes banks give attention to geographic, industry specific demographics, and other market characteristics to operate. Al-Shamrari and Salirni (1998) stated that profitability mainly ROE indicates earning capability of the organization. They also stated that higher return on equity is always desirable as it is one of the main indicators of bank's profitability and efficiency. Shu (2002) conducted studies in Hong Kong and saw affiliation between macroeconomic condition and average asset quality of banks. Kwan (2006) has focused on cost efficiency. Chowdhury and Ahmed (2009) pointed that the profitability of all the selected banks is quite satisfactory. Loans recovery rate indicated that the banks are able to manage their credit efficiently. Every year these banks open new branches and the IBBL has highest number of branches i.e. 176. It is observed that the classified loan of DBBL, DBL and PBL is very low i.e. about 2%. It seems that DBBL, DBL and PBL is able to manage credit efficiently as a result recovery is quite good. Seiford and Zhu (1999) considered the Return on Asset, Return on Equity, Interest Margin and Net Profit Margin in analyzing the cause-and-effect of banks' success Harker and Zenios, (1999) Various sets of performance ensure the successful presence of banks in specific territory like number of employees, branch coverage, population coverage of branch and ATM network, per employee expense, credit and deposit ratio, number of deposit and credit accounts. Johnston and Buttle (2001) stated that the performance of bank depends on financial position and its stock market performance. Siddique and Islam (2001) identified some extensive features which affect the profitability of the banking sectors. They have drawn a regression analysis and found the result significant

by taking profitability as the dependent variable and factors like number of employees, number of branches, amount of investment, amount of asset, amount of time deposit and number of advance account as independent variables. Ahmad and Hassan (2007) stated that performance depends on the asset quality, capital ratios, operational ratios such as net profit margin, net interest income, income to asset ratio, non-interest income to asset ratio and liquidity ratios. Jahangir et.al (2007) stated that loan-to-deposit ratio works as a very good indicator of banks' profitability and smooth growth ensures higher future returns to shareholders and there lies the profitability which means not only current profits but future returns as well. Mittal and Dhade (2007) stated that productivity and profitability are interrelated. Though productivity is not the sole factor, it is an important factor influencing profitability. The key to increase profitability is increased productivity. The key to success in the competitive environment is increased productivity and profitability. Bhatt & Ghosh (1992) observed that the profitability of commercial banks depend on several factors some of them are endogenous and some exogenous. The endogenous factors represent control of expenditure, expansion of banking business, timely recovery of loans and productivity. The exogenous factors consist of direct investments such as SLR (Statutory Liquidity Ratio), CRR (Cash Reserve Ratio) and directed credit programs such as region wise, population wise guidelines on lending to priority sectors. Hossain and Bhuiyan (1990) stated that there is no universally accepted operational definition of performance measures. In broad sense performance level of an enterprise can be measured by the extent of its organizational effectiveness. In the context of services rendered towards public the performance of an organization can be viewed as 'the extent to which its work is carried out within established specifications for goods and services produced, to the general satisfaction of the clientele served, within given cost and time constraints, and in such a manner as to support or contribute to the achievement of the organization objectives.

Analysis of the Study

The researchers have done financial analysis of the selected five Banks to make comparison between financial data of the banks for last five years (i.e. from 2005–2009). This information can be used as a benchmark against which an individual bank's asset and liability structure and earnings may be measured. Four types of analysis have been shown in this study; like – Ratio analysis, Growth percentage analysis, Trend equation analysis & Square of coefficient correlation analysis.

Ratio Analysis: Ratio analysis is a type of analysis that helps to better understand and guide the financial affairs of the business. A ratio is a mathematical expression and is computed using information from the balance sheet or income statement. Ratio is the relationship of one item to another in simple mathematical form (Mahmud and Kalam, 2009). It is shown from the ROE ratio analysis (Table 1 of Appendix) that in 2005, 2007, 2008 and 2009 Bank Asia was the best bank among five selected banks. In 2006 Prime Bank was the top bank. From the ROA ratio analysis of five banks (Table 2 of Appendix), it is revealed that in 2005 & 2008 Eastern Bank was the best performer among five selected banks. Basic Bank, Southeast bank and Prime Bank were the best bank in 2006, 2007, and 2009 respectively. It is exposed from the following table (Table 3 of Appendix) that Prime Bank is in the peaked position than rest of selected banks in accordance of equity multiplier analysis in 2006 & 2007. It is also shown from the said analysis that in 2008 & 2009 Basic Bank & in 2005 Southeast bank is the best bank. It is revealed from the Profit Margin ratio analysis (Table 4 of Appendix) that in 2005, 2008 & 2009 Eastern Bank is in pointed position among sample banks in terms of profit earnings. In 2006 Basic Bank & in 2007 Bank Asia is the best bank. From the analysis of Assets utilization ratio (Table 5 of Appendix) it is discovered that in 2005, 2007 & 2009 Eastern Bank is the best performer among selected banks and in 2006 & 2008 Southeast Bank is in zenith position in accordance of assets utilization. It is shown from the Net Interest Margin ratio analysis (Table 6 of Appendix) that in 2007, 2008 & 2009 Eastern Bank is in the best position than other selected banks in terms of net interest margin.

Besides, Basic Bank became the best bank in 2005 & 2006. From the Table 7 of Appendix, it is shown that in terms of loans and advance Bank Asia is in the highest position in 2008 & 2009 than rest of four selected banks. It is also discovered by the loan ratio analysis that Prime Bank, Southeast Bank and Eastern Bank occupied the most sustainable position in 2005, 2006 & 2007 respectively for growth of loans and advance. It is exposed from the Table 8 of Appendix 8 that from 2005 to 2009 Basic bank performed best than other banks in terms of interest expense of total assess. It shown from the Tax ratio analysis of five banks Table 9 of Appendix 9 that Eastern Bank reached in the peaked position in 2006 & 2009 among selected banks. Moreover, in 2005, 2007 and 2008, Prime Bank, Basic Bank, and Bank Asia performed better in the same circumstances. In terms of cash ratio analysis, it is revealed from the analysis (Table 10 of Appendix) that Bank Asia is in highest position than other banks in 2005 2006 & 2009. In addition, in 2008 & 2009 Basic Bank exposed himself as the best bank in accordance of cash ratio.

Growth Percentage Analysis: Growth percentage is the amount of increase that a specific variable has gained within a specific period and context. In a word growth is a percentage increase or decrease in a particular subject between two time periods. (Investopedia.com, 2010). Table 11 of Appendix shows growth of branches of selected banks. From the table in 2006 & 2009 Bank Asia is the best banks in terms of growth. In 2007 Southeast Bank and in 2008 EBL is the best bank. Table 12 of Appendix shows growth of employees of selected banks. From the table Bank Asia is the best banks in terms of growth of employees during the year 2005 to 2009. Table 13 of Appendix shows growth of Deposit of selected banks. From the table in 2006 Prime Bank, in 2007 Basic Bank, in 2008 Bank Asia and in 2009 Southeast Bank is the best banks in terms of growth of deposit during the year 2005 to 2009. Table 14 of Appendix shows growth of Loans & Advance of selected banks. From the table in 2006 Eastern Bank in 2007, Prime Bank in 2008 Bank Asia and in 2009 Southeast Bank is the best banks in terms of growth of loans and advances during the year 2005 to 2009. Table 15 of Appendix shows growth of Net income of selected banks. From the table in 2006 Southeast Bank in 2007 Bank Asia, in 2008 Basic Bank and in 2009 Prime Bank is the best banks in terms of growth of net income during the year 2005 to 2009. Table 16 of Appendix shows growth of EPS of selected banks. From the table in 2006, Southeast Bank in 2007, Bank Asia in 2008, Basic Bank and in 2009 Prime Bank are the best banks in terms of growth of EPS during the year 2005 to 2009.

Trend Equation Analysis and Square Coefficient Correlation Analysis: Forecasting or predicting is an essential tool in any decision making process. Time series analysis is a quantitative method which is used to determine patterns in data collected over time. The researchers project these patterns to arrive at an estimate for the future. Thus, time series analysis helps us to cope with uncertainty about the future.

Trend Equation and r^2 of Branches: Table 17 of Appendix shows the summary of trend equation and r^2 of Branch expansion of selected banks. It is reflected from the table that trend equation of all the selected banks are positive and goodness of fit of all the equations are high i.e. more than 0.50. Here r^2 of branches of Bank Asia is 0.98 i.e. change of dependent variable (number of branches) by 98% is occurred by the change of independent variable (year). In case of Basic Bank r^2 of branches is 0.89 i.e. change of dependent variable (number of branches) by 89% is occurred by the change of independent variable (year). In case of Eastern Bank r^2 of branches is 0.97 i.e. change of dependent variable (number of branches) by 97% is occurred by the change of independent variable (year).

Trend Equation and r^2 of Number of Employees: Table 18 of Appendix shows the summary of trend equation and r^2 of employees of selected banks. It is shown from the table that the trend equation of all the selected banks is positive. Goodness of fit of all the selected banks are high i.e. more than 0.96 except Basic

Bank Ltd. Here r^2 of employees of Bank Asia is 0.97 i.e. change of dependent variable (number of employees) by 97% is occurred by the change of independent variable (year). In case of Basic Bank r^2 of employees is 0.96 i.e. change of dependent variable (number of employees) by 96% is occurred by the change of independent variable (year). In case of Eastern Bank r^2 of employees is 0.99 i.e. change of dependent variable (number of employees) by 99% is occurred by the change of independent variable (year). In case of Prime Bank r^2 of employees is 0.99 i.e. change of dependent variable (number of employees) by 99% is occurred by the change of independent variable (year). In case of Southeast Bank r^2 of employees is 0.98 i.e. change of dependent variable (number of employees) by 98% is occurred by the change of independent variable (year).

Trend Equation and r^2 of Net Income: Table 19 of Appendix show the summary trend equation and r^2 of net income of selected banks. It is revealed from the table that the trend equation of all the selected banks is positive and goodness of fit of all the selected private commercial banks are very high i.e. more than 0.60 except Basic Bank i.e. 0.46. Here r^2 of net income of Bank Asia is 0.81 i.e. change of dependent variable (net income) by 81% is occurred by the change of independent variable (year). In case of Basic Bank r^2 of net income is 0.46 i.e. change of dependent variable (net income) by 46% is occurred by the change of independent variable (year). In case of Eastern Bank r^2 of net income is 0.63 i.e. change of dependent variable (net income) by 63% is occurred by the change of independent variable (year). In case of Prime Bank r^2 of net income is 0.77 i.e. change of dependent variable (net income) by 77% is occurred by the change of independent variable (year). In case of Southeast Bank r^2 of net income is 0.73 i.e. change of dependent variable (net income) by 73% is occurred by the change of independent variable (year).

Trend Equation and r^2 of EPS: Table 20 of Appendix shows the summary of trend equations and r^2 of EPS of selected banks. It is shown from the table that the trend equation of Bank Asia, Prime Bank, and Southeast Bank are positive and goodness of fit of Bank Asia is better than other four. It is also observed that trend equation Basic Bank and Eastern Bank are negative. Here r^2 of EPS of Bank Asia is 0.42 i.e. change of dependent variable (EPS) by 42% is occurred by the change of independent variable (year). In case of Basic Bank r^2 of EPS is 0.00063 i.e. change of dependent variable (EPS) by 0.063% is occurred by the change of independent variable (year). In case of Eastern Bank r^2 of EPS is 0.096 i.e. change of dependent variable (EPS) by 9.6% is occurred by the change of independent variable (year). In case of Prime Bank r^2 of EPS is 0.365 i.e. change of dependent variable (EPS) by 36% is occurred by the change of independent variable (year). In case of Southeast Bank r^2 of EPS is 0.016 i.e. change of dependent variable (EPS) by 1.6% is occurred by the change of independent variable (year).

Trend Equation and r^2 of Deposits: Table 21 of Appendix shows the summary of the trend equation and r^2 of deposits of selected banks. It is exposed from the table that the trend equation of all the selected banks are positive and goodness of fit of all the Banks are very high i.e. more than 0.80 except Basic Bank. Here r^2 of Deposit of Bank Asia is 0.96 i.e. change of dependent variable (Deposit) by 96% is occurred by the change of independent variable (year). In case of Basic Bank r^2 of Deposit is 0.80 i.e. change of dependent variable (Deposit) by 80% is occurred by the change of independent variable (year). In case of Eastern Bank r^2 of Deposit is 0.97 i.e. change of dependent variable (Deposit) by 97% is occurred by the change of independent variable (year). In case of Prime Bank r^2 of Deposit is 0.99 i.e. change of dependent variable (Deposit) by 99% is occurred by the change of independent variable (year). In case of Southeast Bank r^2 of Deposit is 0.93 i.e. change of dependent variable (Deposit) by 93% is occurred by the change of independent variable (year).

Correlation Analysis: The researchers also analyze correlation between deposit & branches, Net income & EPS, and branches & employees.

Correlation between Deposit and Branches: Table 22 of Appendix shows the summary of correlation between deposit & branches of selected five banks. It is reflected from the table that Correlation between deposit and branches of all the selected banks is higher than 0.90 i.e. there is higher degree of positive correlation exists between deposit & branches in case of all the selected banks. In context of Bank Asia $r = 0.98$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between deposit & branches of Bank Asia while for Basic Bank $r = 0.91$ i.e. $0 < r < 1$ and it is shown that there is a higher degree of positive correlation exists between deposit & branches of Basic Bank. In perspective of Eastern Bank $r = 0.99$ i.e. $0 < r < 1$ and there is a higher degree of positive correlation exists between deposit & branches of Eastern Bank whilst for Prime Bank $r = 0.99$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between deposit & branches of Prime Bank. Moreover, for Southeast Bank $r = 0.98$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between deposit & branches of Southeast Bank.

Correlation between Branches and Employees: Table 23 of Appendix shows the summary of correlation between branches & employees of selected five banks. It is reflected from the table that Correlation between branches & employees of all the selected banks is higher than 0.95 I.e. there is higher degree of positive correlation exists between branches & employees in case of all the selected banks. For Bank Asia $r = 0.99$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between branches & employees of Bank Asia whereas in Basic Bank $r = 0.98$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between branches & employees of Basic Bank. In case of Eastern Bank, moreover, $r = 0.99$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between branches & employees of Eastern Bank. In addition, Prime Bank reached $r = 0.99$ i.e. $0 < r < 1$. And, there is a higher degree of positive correlation exists between branches & employees of Prime Bank while Southeast Bank: Here $r = 0.98$ i.e. $0 < r < 1$. So, there is a higher degree of positive correlation exists between branches & employees of Southeast Bank.

Correlation between Net income and EPS: Table 24 of Appendix shows the summary of correlation between net income & EPS of selected five banks. It is reflected from the table that Correlation between net income & EPS of the selected four banks is higher than 0.30 but lower than 0.90 I.e. there is moderate degree of positive correlation exists between net income & EPS in case of selected four banks but Banks Asia Shows a higher degree of positive correlation i.e. 0.90. In respect of Bank Asia $r = 0.90$ i.e. $0 < r < 1$ and there is a higher degree of positive correlation exists between net income & EPS of Bank Asia. Besides, Basic Bank had $r = 0.71$ i.e. $0 < r < 1$ with a moderate degree of positive correlation between net income & EPS of Basic Bank. In addition, for Eastern Bank $r = 0.34$ i.e. $0 < r < 1$ along with a moderate degree of positive correlation between net income & EPS of Eastern Bank. Furthermore, Prime Bank had $r = 0.87$ i.e. $0 < r < 1$ with a moderate degree of positive correlation between net income & EPS of Prime Bank whilst there is $r = 0.53$ i.e. $0 < r < 1$ in context of Southeast Bank along with a moderate degree of positive correlation existed between net income & EPS of Southeast Bank.

Findings of the Study

From the analysis, the major findings of the selected banks are as follows:

i. In perspective of the Bank Asia, the bank performed well in case of ROE ratio. The bank was placed the best bank in four years during the last five years. But its performance is poor in case of ROA ratio. ROA shows that the efficiency of the management in utilizing its assets to make profit. In this sense the management of Bank Asia was not efficient enough during the last five years. Among the other four banks profit margin ratio of Bank Asia is not satisfactory except 2007. Assets utilization ratio is also unsatisfactory, which indicates the incompetence of the management. Net interest margin ratio is not good enough, which means that management was failed to achieve close control over the banks earnings at the cheapest sources of funding. Cash ratio of

Bank Asia is higher in terms of liquidity for the consecutive three years that means they were not taking risk for investing money which might be generate more revenue for the particular year. Another problem of Bank Asia is that, the number of branches is limited. They have only forty one branches at the end of 2009. Growth of deposit collection and growth of loan is not satisfactory except 2008. Growth of net income and growth of EPS is not satisfactory in 2008.

ii. In case of Basic Bank, ROE ratio is not satisfactory over the last five years that is bad news for the investor. Its performance is poor in case of ROA ratio except 2006. Among the five banks profit margin ratio of Basic Banks is not satisfactory except 2007, which is frustrating news for the investor. If profit is low, there is a chance of less dividend declaration or no dividend. Assets utilization ratio is also unsatisfactory, which indicates the incompetence of the management. Net interest margin ratio is not good enough for the last three years, which means that management was failed to achieve close control over the banks earnings at the cheapest sources of funding. Cash ratio of Basic Bank is higher in terms of liquidity for the last two years, that means they were not taking risk for investing money which might be generate more revenue for the particular year. Another problem of Basic Bank is that, the number of branches is limited. They have only thirty two branches at the end of 2009 and have a zero growth in 2008. Growth of deposit collection and growth of loan is not satisfactory except 2007. Growth of net income and growth of EPS is not satisfactory and shows a negative growth in 2007. And trend equation of EPS is negative also.

iii. In context of Eastern Bank, ROE ratio is not satisfactory over the last five years that is not good for the investors. Its performance is better in case of ROA ratio in 2005 and 2008. Among the five banks profit margin ratio of EBL is satisfactory, they reached the best position in three times out of the last five years, which is very good news for the investor. Assets utilization ratio is also satisfactory for three times, which indicates the proficiency of the management. Net interest margin ratio is also good for the last three years, which means that management was able to achieve close control over the banks earnings at the cheapest sources of funding. Loan ratio is not good enough except 2007. Cash ratio of EBL is not good in terms of liquidity, that means they were taking risk for investing money which might be generate more revenue for the particular year. One of the problems of Eastern Bank is that, the number of branches is limited. They have only thirty nine branches at the end of 2009. Growth of deposit collection and growth of loan is not satisfactory except 2006 in case of loans. Growth of net income and growth of EPS is not satisfactory, shows a negative growth in 2006 and 2007 in both cases. And trend equation of EPS is negative also.

iv. In respect of Prime Bank, ROE ratio is not satisfactory over the last five years except 2006 which is bad news for the investor. Its performance is not excellent in case of ROA ratio except in 2009. Among the five banks profit margin ratio of PBL is also unsatisfactory, they failed to reach the best position in any years out of the last five years, which is very bad news for the investor. Assets utilization ratio is also unsatisfactory, which indicates the incompetence of the management. Net interest margin ratio is also bad for the last five years, which means that management was unable to achieve close control over the banks earnings at the cheapest sources of funding. Loan ratio is fine only in 2005. Cash ratio of PBL is not good in terms of liquidity, that means they were taking risk for investing money, which might be generate more revenue for the particular year. Among other four banks number of branches is highest in Prime bank. They have eighty four branches at the end of 2009, but growth rate of branches is unsatisfactory. Growth of deposit collection and growth of loan is not satisfactory except 2006 in case of deposit and 2007 in case of loan. Growth of net income and growth of EPS is satisfactory, shows a positive growth in 2009 in both cases. And all the trend equation is positive.

v. In case of Southeast Bank Ltd., ROE ratio is not satisfactory over the last five years which is bad news for the investor. Its performance is not excellent in case of ROA ratio except in 2007. Among the five banks profit margin ratio of SBL is also unsatisfactory, they failed to reach the best position in any years out of the last five

years, which is very bad news for the investor. Assets utilization ratio is satisfactory in 2006 and in 2008, which indicates the competence of the management. Net interest margin ratio is unsatisfactory for the last five years, which means that management was unable to achieve close control over the banks earnings at the cheapest sources of funding. Loan ratio is fine only in 2005. Cash ratio of SBL is not good in terms of liquidity, that means they were taking risk for investing money, which might be generate more revenue for the particular year. One of the problems of Southeast Bank is that, the number of branches is limited. They have only fifty six branches at the end of 2009, though they have second highest number of branches among other four banks, but growth rate of branches is unsatisfactory except 2007. Growth of deposit collection and growth of loan is not satisfactory except 2009 in both cases. Growth of net income and growth of EPS is satisfactory only in 2006, shows a positive growth in both cases. And all the trend equation is positive.

Conclusion

After commencement, the private commercial banks play a vital role in the economic development of the country. The selected private commercial banks create employment opportunities for more than six thousand people at the end 2009. It has been observed that the net income of the selected private commercial banks have increased from the previous year during 2005 to 2009. It is also reflected from the analysis that the EPS of all the selected commercial banks are very high during 2005 to 2009. It indicates the profitability of all the selected banks is quite satisfactory. Every year these banks open new branches and the Prime Bank has highest number of branches i.e. 84. Moreover, ROE is deemed as stable growth for Bank Asia and Prime Bank but Basic Bank, Eastern Bank and Southeast Bank have an unstable growth. In case of ROA of all the selected Banks have better position. In case of other ratio all of the selected banks have a good position except Basic Bank in some cases like profit margin, net interest margin etc. Five trend equations have been tested for different activities of the private commercial banks. Among them the trend value of branches, employees, deposits and net income are positive incase of all the selected banks. Square of correlation coefficient (r^2) has also been tested for all trend equations. The r^2 of branches deposits and net income is more than 0.5 except Basic Bank. It indicates the prospect of private commercial banks in Bangladesh is very bright. In 2008 the growth percentage of branches of Basic bank was zero. In order to increase the activities and income these banks need to expand more of its new branches. From the sequence of my analysis it is reflected that although the deposit of all the selected banks have showed an increasing trend during the period of 2005 to 2009, the total deposits of Basic Bank, Eastern Bank and Bank Asia are not satisfactory in comparison with Prime Bank and Southeast Bank. So these banks need to increase their deposits. It has been identified that although almost every year's loans and advances of selected private commercial banks have increased from the previous year, the growth rate of loans and advances is not satisfactory for Basic Bank. So it should try to increase the growth rate. Basic Bank need to increase its net income by increasing deposits, decreasing cost and expanding more branches. As the net income of Prime Bank and Southeast Bank is fluctuating, the bank should try to keep it at a stable point. If the banking sector able to overcome its present problems, it may contribute in the rapid development of the economy of Bangladesh.

Recommendations

- i. Bank Asia LTD should expand its branch network not only in urban areas but also in metropolitan areas of the different zone of the country for deposit mobilization. Besides, it should be conscious about proper utilization of assets, liquidity, and earnings per share.
- ii. Management of Basic Bank, Eastern Bank, Prime Bank and Southeast Bank should be aware about ROE. They should give emphasis to increase shareholder's earnings as well as ensuring proper utilization of assets in

order to increase ROA which is the indicator of efficiency of the management. In addition, management of these banks should take care for increasing net interest margin, net income, EPS and number of branches.

References

- Ahmad, A U F and Hassan, M K (2007). "Regulation and performance of Islamic banking in Bangladesh". *Thunderbird International Business Review*, Vol. 49, No- 2, pp. 251-277.
- Allen, R (1997). "Alternative Approaches to the Diversification of Portfolios". *Credit Risk in Banking*, pp. 166-188.
- Al-Skanzmari M and Salimi A (1998). "Modeling the operating efficiency of banks, A parametric methodology". *Journal of Logistic Information Management*, Vol. 11, pp. 5-17.
- Berger, A N and Humphrey, D D (1997). "Efficiency of financial institutions: International Survey and directions for future research". *European Journal of Operation Research*, Vol. 98, pp. 175-212.
- Bhatt P R and Ghosh R (1992). "Profitability of Commercial Banks in India". *Indian Journal of Economics*, India, Vol. , pp. 14-27.
- Chowdhury, T A and Ahmed, K (2009). "Performance Evaluation of Selected Private Commercial Banks in Bangladesh". *International Journal of Business and Management*, Vol. 4, No- 4, pp. 86-97.
- Hossain, M K and Bhuiyan, R H (1990). "Performance Dynamics of Nationalized Commercial Banks in Bangladesh". *Journal of Business Studies*, Vol. 11, No- 1,
- Jahangir, N, Shill S and Haque, M A J (2007). "Examination of Profitability in the Context of Bangladesh Banking Industry". *ABAC Journal*, Vol. 27, No- 2, pp. 36-46.
- Kwan, Simon (2006), "The X-Efficiency of commercial banks in Hong Kong," *Journal of Banking and Finance*, Vol. 30, No. 4. pp. 1127-47.
- Levin, I R and Rubin, D S (2009). *Statistics for Management*, 7th Edition. India: Prentice-Hall publication, pp. 862-905 and pp. 648-699.
- Mahmud, K A and Kalam, M A (2009). *Principles of Finance*, 7th Edition. Dhaka: Commerce publication, pp. 47-90.
- Mittal, M and Dhade, A (2007). "Profitability and Productivity in Indian Banks: A Comparative Study". *International Journal AIMS*, Vol. 1, No- 2, pp. 137-152.
- Seiford, L M, and Zhu, J (1999). "Profitability and Marketability of the Top 55 U.S. Commercial Banks". *Management Science*, Vol. 45, No- 9, pp. 1270-1288.
- Shu, C (2002). "The impact of macroeconomic environment on the asset quality of Hong Kong's banking sector". *Hong Kong Monetary Authority Research Memorandum*, Vol.1, No- 2, pp. 137-152.

Appendix

Table 01: ROE Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	24.47%	24.40%	27.50%	20.60%	26.79%
Basic Bank	16.56%	24.75%	10.90%	18.44%	16.54%
Eastern Bank	17.78%	15.48%	10.95%	16.86%	17.26%
Prime Bank	20.23%	27.25%	26.57%	18.40%	23.70%
Southeast Bank	16.73%	18.42%	18.91%	11.59%	18.84%
Best Bank	Bank	Prime Bank	Bank Asia	Bank Asia	Bank Asia

Table 02: ROA Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	1.64%	1.56%	1.89%	1.29%	1.93%
Basic Bank	1.05%	1.88%	0.729%	1.18%	1.41%
Eastern Bank	1.99%	1.43%	1.04%	1.46%	2.08%
Prime Bank	1.36%	1.72%	1.76%	1.12%	2.23%
Southeast Bank	0.864%	1.69%	1.90%	1.09%	1.65%
Best Bank	EBL	Basic Bank	Southeast	EBL	Prime

Table 03: Equity Multiplier Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	14.92	15.63	14.56	16.01	13.86
Basic Bank	6.92	9.86	14.93	20.84	26.48
Eastern Bank	8.92	10.85	10.50	11.54	8.29
Prime Bank	14.78	15.78	15.09	16.49	10.63
Southeast Bank	19.36	10.87	9.95	10.62	11.35
Best Bank	Southeast	Prime Bank	Prime	Basic Bank	Basic

Table 04: Profit Margin Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	47.90%	44.39%	46.08%	36.05%	50.71%
Basic Bank	45.43%	54.78%	25.93%	35.85%	41.37%
Eastern Bank	56.46%	45.23%	32.58%	41.33%	53.87%
Prime Bank	37.37%	49.37%	43.01%	32.02%	52.64%
Southeast Bank	25.40%	44.11%	41.94%	29.45%	40.53%
Best Bank	EBL	Basic Bank	Bank Asia	EBL	EBL

Table 05: Assets Utilization Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	3.42%	3.52%	4.10%	3.57%	3.81%
Basic Bank	2.32%	3.44%	2.81%	3.29%	3.43%
Eastern Bank	3.85%	3.78%	4.65%	4.37%	4.27%
Prime Bank	3.66%	3.50%	4.09%	3.48%	4.24%
Southeast Bank	3.40%	3.84%	4.53%	4.53%	3.71%
Best Bank	EBL	Southeast	EBL	Southeast	EBL

Table 06: Net Interest Margin Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	1.90%	2.15%	2.49%	2.31%	2.55%
Basic Bank	2.94%	3.27%	2.42%	2.40%	2.20%
Eastern Bank	2.59%	1.86%	3.26%	2.84%	3.10%
Prime Bank	2.83%	2.46%	2.39%	1.78%	1.92%
Southeast Bank	2.13%	1.98%	2.42%	1.63%	0.992%
Best Bank	Basic	Basic	EBL	EBL	EBL

Table 07: Loan Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	76.43%	73.02%	74.05%	74.90%	73.21%
Basic Bank	56.53%	64.59%	57.42%	58.44%	64.03%
Eastern Bank	64.81%	72.30%	77.01%	72.64%	68.22%
Prime Bank	76.89%	73.91%	72.47%	68.05%	71.51%
Southeast Bank	75.18%	76.62%	74.82%	74.25%	68.78%
Best Bank	Prime	Southeast	EBL	Bank Asia	Bank Asia

Table 08: Interest Expense to Total Assets Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	5.82%	7.17%	7.04%	7.01%	6.55%
Basic Bank	3.63%	4.47%	4.97%	5.81%	6.29%
Eastern Bank	4.98%	6.01%	6.22%	6.74%	5.80%
Prime Bank	5.47%	6.07%	6.62%	6.45%	6.75%
Southeast Bank	6.10%	7.53%	7.54%	7.65%	6.96%
Best Bank	Basic	Basic	Basic	Basic	Basic

Table 09: Tax Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	36.46%	50.81%	51.73%	51.15%	41.95%
Basic Bank	46.52%	29.29%	58.83%	31.73%	42.53%
Eastern Bank	32.12%	50.98%	56.24%	48.67%	42.65%
Prime Bank	52.71%	39.57%	40.31%	50.02%	39.33%
Southeast Bank	32.50%	41.28%	44.21%	44.33%	40.72%
Best Bank	Prime	EBL	Basic	Bank Asia	EBL

Table 10: Cash Ratio of Five Banks

Name of the Banks	Year				
	2005	2006	2007	2008	2009
Bank Asia	3.25%	5.85%	5.75%	0.62%	0.69%
Basic Bank	0.59%	5.18%	5.48%	5.66%	5.31%
Eastern Bank	0.71%	1.11%	0.95%	0.78%	0.68%
Prime Bank	0.66%	0.74%	0.83%	0.68%	0.74%
Southeast Bank	0.62%	0.56%	0.68%	0.60%	0.53%
Best(Liquidity)	Bank	Bank Asia	Bank Asia	Basic	Basic

Table 11: Growth of Selected Banks

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	26.31%	20.83%	13.79%	24.24%
Basic Bank	3.70%	10.71%	0.00%	3.22%
Eastern Bank	13.63%	12%	21.42%	14.70%
Prime Bank	21.95%	22%	14.75%	20%
Southeast Bank	0.00%	22.58%	21.05%	21.73%
Best Bank	Bank Asia	Southeast	EBL	Bank Asia

Table 12: Growth of Number of Employees

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	29.72%	24.07%	25.50%	28.55%
Basic Bank	8.31%	10.75%	1.94%	5.57%
Eastern Bank	14.18%	12.74%	10.57%	15.07%
Prime Bank	14.45%	19.45%	10.78%	18.89%
Southeast Bank	9.30%	11.82%	10.30%	13.89%
Best Bank	Bank Asia	Bank Asia	Bank Asia	Bank Asia

Table 13: Growth of Number of Deposit

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	36.70%	18.64%	41.43%	29.22%
Basic Bank	7.88%	32.64%	20.09%	(10.08)%
Eastern Bank	32.68%	16.11%	39.12%	18.32%
Prime Bank	51.92%	28.85%	24.83%	21.51%
Southeast Bank	20.38%	20.45%	23.87%	40.68%
Best Bank	Prime	Basic	Bank Asia	Southeast

Table 14: Growth of Loans and Advances

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	24.54%	27.86%	40.48%	25.75%
Basic Bank	23.86%	17.18%	22.48%	7.31%
Eastern Bank	46.47%	19.05%	28.10%	20.19%
Prime Bank	12.76%	28.16%	30.29%	18.76%
Southeast Bank	26.41%	17.05%	25.16%	28.56%
Best	EBL	Prime	Bank Asia	Southeast

Table 15: Growth of Net Income

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	24.05%	52.52%	(5.36)%	92.27%
Basic Bank	94.10%	(48.94)%	94.32%	18.00%
Eastern Bank	(6.04)%	(18.32)%	90.45%	82.33%
Prime Bank	85.21%	33.17%	(12.06)%	126%
Southeast Bank	143.15%	34.41%	(27.45)%	110.78%
Best	Southeast	Bank Asia	Basic	Prime

Table 16: Growth of EPS

Name of the Banks	Year			
	2006	2007	2008	2009
Bank Asia	3.37%	17.33%	(21.27)%	57.14%
Basic Bank	66.54%	(61.32)%	66.62%	17.99%
Eastern Bank	(24.87)%	(39.04)%	14.26%	69.50%
Prime Bank	48.09%	2.43%	(29.64)%	80.82%
Southeast Bank	68.58%	(16.830)%	(27.45)%	75.63%
Best	Southeast	Bank Asia	Basic	Prime

Table 17: Trend Equation and r^2 of Branches

Name of the Banks	$Yc=a+bx$	r^2
Bank Asia Ltd.	29.2+5.3x	0.98
Basic Bank Ltd.	29.8+ 1.3x	0.89
Eastern Bank Ltd.	29.6+ 4.3x	0.97
Prime Bank Ltd.	61.2+10.6x	0.99
Southeast Bank Ltd.	40.4+ 6.5x	0.92

Table 18: Trend Equation and r^2 of Employees

Name of Banks	$Yc=a+bx$	r^2
Bank Asia Ltd.	676.8+155.5x	0.97
Basic Bank Ltd.	696.8+ 43.4x	0.96
Eastern Bank Ltd.	695.8+83.5 x	0.99
Prime Bank Ltd.	1398.2+201.9x	0.99
Southeast Bank Ltd.	1132+ 121.1x	0.98

Table 19: Trend Equation and r^2 of Net Income

Name of Banks	$Yc=a+bx$	r^2
Bank Asia Ltd.	719.76+209.83x	0.81
Basic Bank Ltd.	464.26+ 72.24x	0.46
Eastern Bank Ltd.	746.2+ 210.30x	0.63
Prime Bank Ltd.	1407.4+461.20x	0.77
Southeast Bank Ltd.	1052.90+ 296.93x	0.73

Table 20: Trend Equation and r^2 of EPS

Name of Banks	$Yc=a+bx$	r^2
Bank Asia Ltd.	47.03+3.803x	0.42
Basic Bank Ltd.	39.78-0.209 x	0.00063
Eastern Bank Ltd.	47.77-2.999 x	0.096
Prime Bank Ltd.	56.78+5.869x	0.365
Southeast Bank Ltd.	44.75+0.984 x	0.016

Table 21: Trend Equation and r^2 of Deposit

Name of Banks	$Yc=a+bx$	r^2
Bank Asia Ltd.	34,212.32+8981.14x	0.96
Basic Bank Ltd.	30,245.63+3863.58x	0.80
Eastern Bank Ltd.	33,154.80+7542.90x	0.97
Prime Bank Ltd.	71247.00+17516.50x	0.99
Southeast Bank Ltd.	61034.42+13948.03x	0.93

Table 22: Correlation between Deposits and Branches

Name of Banks	Correlation(r)	Appendix 16
Bank Asia Ltd.	0.98	Table 1
Basic Bank Ltd.	0.91	Table 2
Eastern Bank Ltd.	0.99	Table 3
Prime Bank Ltd.	0.99	Table 4
Southeast Bank Ltd.	0.98	Table 5

Table 23: Correlation between Branches and Employees

Name of Banks	Correlation(r)	Appendix 17
Bank Asia Ltd.	0.99	Table 1
Basic Bank Ltd.	0.98	Table 2
Eastern Bank Ltd.	0.99	Table 3
Prime Bank Ltd.	0.99	Table 4
Southeast Bank Ltd.	0.98	Table 5

Table 24: Correlation between Net income and EPS

Name of Banks	Correlation(r)	Appendix 18
Bank Asia Ltd.	0.90	Table 1
Basic Bank Ltd.	0.71	Table 2
Eastern Bank Ltd.	0.34	Table 3
Prime Bank Ltd.	0.87	Table 4
Southeast Bank Ltd.	0.53	Table 5