**Chapter – 1**

**1.1 Introduction of the Company:**

We have selected Power Grid Company of Bangladesh Limited as the company to analyze the financial condition. Here is a short overview of the company

PGCB was created under the restructuring process of Power Sector in Bangladesh with the objective of bringing about commercial environment including increase in efficiency, establishment of accountability and dynamism in accomplishing its function. PGCB was incorporated in November 1996 with an authorized capital of BDT 10 Billion. PGCB entrusted with transmission assets from Bangladesh Power Development Board and the Dhaka Electric Supply Authority (in present DPDC).

It has paid up capital 3643.58 million BDT

Turnover in 2008-2009: 5713.83 million BDT

Transmission Line as 30.06.2009: 230 Kv – 2644.5 circuit km

 132 Kv – 5607.6 circuit km

Manpower as on 30.06.2009: 1932 Nos.

**1.2 Identification of the Problem**

Book Value per Share is the accounting value of a share, equal to common equity divided by the number of shares outstanding.

Market value is current price of the stock. If the profitability, liquidity, asset and debt management is good market value will probably be as high as can be expected.

From the analysis of five years data we will try to find out the problems and reasons of changes in the Market value of from the price of Tk. 250.00 per share at the beginning of 2005-2006, to Tk.782 .25 at the end of 2008-09. Initially the book value of the share of the company is Tk. 185.67 per share and at the year 2009 it become 390.01

So from the data it is evident that the Market value is substantially greater than the book value. So we can say for our concern company that,

**Market value > Book value**

So this is good news for company. So, Company is enjoying a healthy financial status. In our report we shall diagnose all the data and we shall established the reason behind the fact.

We will also look how PCGB is managing the Liquidity, Asset, Debt, and observe the implications on Profitability and Market Value.

**1.3 Objective of the Study**

The objective of this study is to identify the financial strength of Power Grid Company of Bangladesh Ltd. by analyzing their accounting statements for a definite period and to compare their book value with the market value of the share and finding out the reason of the discrepancy about this issue.

Have detail understanding about the instruments of finance.

* Make a thorough analysis of the company’s financial statements over the last 5 years with the aid of ratio analysis, cash flow and analysis of major components of the balance sheet.
* Find out PGCB’s financial strength and level of competency.
* Find out where PGCB stands.
* Find out the strength and weaknesses of PGCB Limited.

**1.4 Methodology**

**1.4.1 Statistical Technique**

We used bar chart and line chart to interpret the processed data.

**1.4.2 Nature of Data**

Data had been used during the preparation of this report, is secondary data.

**1.4.3 Sources of Data**

This report was prepared mainly based on the secondary data available in the market. The secondary data was collected from the internet, newspapers and the company’s annual reports. The report prepared from the analysis of the raw data is of the formal type and the information from the secondary data was used to support the findings of the financial analysis.

**1.4.4 Period under Consideration**

Data for the last five financial years, starting from 2005 up to 2009, had been taken under consideration while preparing this report.

We have considered last 5 years data for the company’s statistical and financial trend analysis.

**1.4.5 Nature of Analysis**

We mainly relied on “Cross Sectional Study” to compare between the two rival firms. To monitor the performance of our company of focus over the years with respect to “Ratio Analysis”, “Cash Flow Statement Analysis”, “Balance Sheet and Income Statement Analysis” which helped us identify any specific trends or fluctuations occurred during the periods taken into consideration for analysis.

The ratio had been analyzed with respect to three viewpoints, benchmarking, time series analysis and cross section analysis.

In the ratio analysis five types of ratios had been considered, namely

* Liquidity Ratio
* Debt Management Ratio
* Asset Management Ratio
* Profitability Ratio
* Market Value Ratio

**1.4.6 Standard of Comparison**

We relied on “Cross Sectional Study” as standard for comparison of the performance of “Power Grid Company of Bangladesh Limited” with “Dhaka Electric Supply Company Limited”. Due to unavailability of data and also difficulty of calculation of the “Industry Averages”, we carried out ratio analysis of both the companies for the last 5 years and compared their performances with respect to all the major ratios. Finally, we came up with our comments regarding relative performances of each company in due course of time.

We took DESCO as the comparison of PGCB because both are in the Energy industry and enjoying healthy financial position with hot demand of their shares. Both company started their journey in 1996.

**1.5 Limitation**

Time was a very big constraint during the process of preparation of this report. As the report had been prepared over a time period of only two months, time had to be budgeted and scheduled very calculatedly. There was very little time that can be used as lagging in case something falls behind schedule.

Also the unavailability of all the annual financial reports of the company and market price had been a bottle neck throughout the entire preparation of the report. Another matter of concern was that, the report considers data only from the last five financial years. This may not be sufficient to clearly show the reasons for the deviations in share prices along those years. A report with analysis of the last ten to fifteen year may have been more precise and accurate.

Moreover many companies practice ambiguous accounting practices to get rid of tax that dilute the actual scenario. Also sometimes, these companies try to make their performance much more lucrative to the Shareholders by means of unethical practice which are completely unnoticeable to general public. Such practice if had taken place might have diluted our findings which are based on the information available in the “Annual Reports”.

**Chapter – 2**

**Analysis of Balance Sheet**

**2.1 Asset**

**Current Asset**

Current assets of PGCB limited have grown quite steadily over the years. In 2005 current assets of company was TK 6,618,922,561. In 2006 it was TK 7,703,655,106. In 2009 current assets of company is TK 13,106,397,654. This steady growth may indicate quite a number of things. For instance, the steady rise in accounts receivables indicate that the rate of sales have increased at quite a healthy rate over the years. A healthy amount of current assets are important for any company as it will eventually increase its solvency and improve creditworthiness.

Figure -1: Current Asset

**Fixed Asset**

PGCB Limited has invested quite intensely over the years. Among them, increase in property, plant and equipment is very prominent and it also shows the company’s rise during these years. In 2005, the net fixed asset was BDT 29,325,446,900. In the year 2009 it is become now BDT 45,609,665,389. The following figure shows the increasing trend in net fixed asset.

Figure -2: Net Fixed Asset

**Capital Work in Progress**

In the year 2005 PGCB had capital work in progress worth BDT 4,737,508,401. The next four years showed huge increases in this aspect. In 2008 it was BDT 20,871,081,989. In 2009 the capital works in progress worth of BDT 12,474,463,900. It is reduced due to the completion of some big project.

Figure -3: Capital Work in Progress

**2.2 Liability and Equity**

**Total Liabilities**

There has been steady rise in overall liabilities over the years for PGCB Limited. The reason for this is the expansion of the company over the years and also the rise in operations. The major thing in the liability segment is long term loan, which are provided by ADB loan, GOB loan, SIDA loan etc.

Figure -4: Total Liabilities

**Shareholder’s Equity**

Over the years shareholders of PGCB limited have experienced healthy growth in the total equity. In 2005 it was BDT 6,765,179,584. In 2009 it becomes BDT 14,210,153,534.

Figure -5: Shareholder’s Equity

**2.3 Rationale behind different Market Value and Book Value**

It is not very abnormal for market value to differ with book value of a firm. The reason is, a company is a going concern and when company issues shares to the public, depending on various factors like demand and supply of the firm’s shares, the prices eventually fluctuate. In other words, if a firm is profitable or at least deemed to be profitable, demand for that firm’s share is higher and consequently the share price of that firm’s share is higher. Of course, this can also occur the other way around. Therefore, it is safe to infer that market value of and book value of a company can vary to quite some extent. As a result market value and book value of the company differs in a great extend. Due to this, this change in value can change the value of the shareholder’s equity and not to mention the value of assets, fixed ones in particular. The same principle is obviously also applicable for PGCB limited and any other going concern.

There are lots of factors that indicate fundamental difference of market value and book value, like as below:

Due to undervaluation of fixed asset, there may be a difference in Book value and Market value.

Due to over depreciation of factory building and other fixed asset, it may happen. Like The depreciation rate for the factory building was calculated at some percentage but in reality the actual depreciation rate was lower than that. The depreciation rate for other fixed assets was also over estimated than in reality. In other words, depreciation is often overestimated and applied accordingly.

Due to intangible asset like goodwill, patent or trademark etc, Market value may differ from Book value.

Now at date 30th June 2009 Market price is BDT 782.25 and Book value is BDT 390.01.

Now based on the current book value of the firm, balance sheet of 2009 can be summarized as follows:

|  |  |
| --- | --- |
| **Assets** |  |
|  Property, plant and equipment | 33,135,201,489 |
|  Capital Work in progress | 12,474,463,900 |
|  **Total Fixed Assets** | **45,609,665,389** |
|  **Total Current Assets** | **13,106,397,654** |
|  **Total Assets** | **58,716,063,043** |
| **Equity** |  |
|  **Total Equity** | **14,210,153,534** |
| **Liabilities** |  |
|  **Total Long Term Liabilities** | **41,122,360,863** |
|  **Total Current Liabilities** | **3,383,548,646** |
|  **Total Liabilities** | **44,505,909,509** |
|  **Total Equity and Liabilities** | **58,716,063,043** |

The new balance sheet will eliminate the difference between the market price and book value per share. Because of the market price of the share, value of total equity will be increased and therefore value of liability & owners equity will be increased. To apply matching principle, value of the asset should get increased since source of fund is overvalued. Here we have added a certain amount to intangible assets which is goodwill.

|  |  |
| --- | --- |
| **Assets** |  |
|  Property, plant and equipment | 40,281,080,900 |
|  Intangible asset :Goodwill | 7,145,879,420 |
|  Capital Work in progress | 12,474,463,900 |
|  **Total Fixed Assets** | **59,901,142,422** |
|  **Total Current Assets** | **13,106,397,654** |
|  **Total Assets** | **73,007,821,880** |
| **Equity** |  |
|  **Total Equity** | **28,501,912,370** |
| **Liabilities** |  |
|  **Total Long Term Liabilities** | **41,122,360,863** |
|  **Total Current Liabilities** | **3,383,548,646** |
|  **Total Liabilities** | **44,505,909,510** |
|  **Total Equity and Liabilities** | **73,007,821,880** |

**Chapter – 3**

**Cash Flow Analysis**

**3.1 Account Receivable**

Account Receivable is reduced over the period of 2005 to 2007. It was then slightly steady on 2007-2009. Little rise happening over 2007-2009 but it is good because they have some new transmission work. Comparing from 2005 its cash flow is now good.

Figure -6: Account Receivables

**3.2 Net Cash Flow from Operations**

From below figure we can see that Net cash flow from operations increasing over the years 2005 to 2007. From 2007 it’s become little steady.

Figure -7: Net Cash Flow from Operations

**3.3 Net Cash Flow from Investment**

There is huge cash out flow in all five years. In 2007 the cash outflow is the maximum. But it is good for the company. This is because they make investment in plant and machineries which is for future earnings.

Figure -8: Net Cash Flow from Investment

**3.4 Net Cash Flow from Financing Activities**

From the figure below we can see that cash inflow from financial activities in increasing over the period of 2005 to 2008. Suddenly in 2009 it reduced, which is good for the company as it indicates the decrease in debt or repayment. As well as which leads to a lesser amount of interest payment.

Figure -9: Net Cash Flow from Financing Activities

**3.5 Inventories**

PGCB managed their inventories very well. From 2006 to 2009 trend we can observe a declining trend in inventory. But cash increase as well. There is no huge inventory stack up. So it indicates a good amount of cash inflow.

Figure -10: Inventories

**3.6 Closing Cash over the Study Period**

From the figure below it can be observed that PGCB has a good cash positions and it is increasing over the period of 2005 – 2009.

Figure -11: Closing Cash over the study period

**3.7 Overall Comment on Cash Flow**

* The net change of cash flow is positive which indicates that during the years the firm has more cash inflow than outflow. So, it can be said that the company has grown strongly over the years.
* There inventory is well managed and no stack up huge inventories, which indicates a decent cash in-flow over the years.
* Accounts Receivable is reduced form 2005 to 2009. Slightly increasing on 2007 to 2009 but it is very steady. Reducing Accounts Receivable indicates the good cash inflow over the years.
* Over the years they invested huge amount on fixed asset like transmission line, plant, machineries etc, which consumes huge cash, but this is good for their future growth.

**Chapter – 4**

**Ratio Analysis**

Ratio analysis is the calculation and comparison of ratios which are derived from the information in a company's financial statements. The level and historical trends of these ratios can be used to make inferences about a company's financial condition, its operations and attractiveness as an investment. To evaluate a firm’s financial condition and performance, the financial analyst usually performs analysis on various aspects to find out the financial health of the firm; among which ratio analysis is one of the most important and commonly used methods. In this study various ratio analyses will be done to understand the financial condition of the company and to compare this condition with its rival firm. The financial ratios can be analyzed based on three criteria:

* **Benchmark Analysis:** A benchmark is a point of reference with which the financial ratios of the specific company can be compared. For example, the current ratio of 2:1 is considered to be ideal for a company and it is assumed to be the benchmark.
* **Time Series Analysis:** It involves comparing a present ratio with past and expected future ratios for the company. For instance, the current ratio (the ratio of current assets to current liabilities) for the present year could be compared with the current ratio for the previous years. When financial ratios are arranged over a period of years, the analyst can study the composition of change and determine whether there has been an improvement or deterioration in the firm’s financial condition and performance over time.
* **Cross Section Analysis:** The third method of comparison involves comparing the ratios of one with those of similar firms or with industry averages at the same point in time. Such a comparison gives insight into the relative financial condition and performance of the firm. It also helps us to identify any significant deviation from any applicable industry average.

In this paper, ratios of PGCB Ltd and DESCO Ltd are calculated and analyzed based on bench mark, time series and cross sectional analysis.

**4.1 Liquidity Ratio**

Liquidity or Short Term Solvency ratios are used to determine a company's ability to pay off its short-terms debts obligations. The higher the value of the ratios, the larger will be the margin of safety that the company possesses to cover short-term debts. It shows the relationship of a firm’s cash and other current assets to its current liabilities. Different types of liquidity ratios are discussed below.

**4.1.1 Current Ratio**

Current Ratio is the ratio of current assets to current liabilities. The current ratio indicates the ability of a company to pay its current liabilities from current assets and shows the strength of the company’s working capital position. Current ratio of 2:1 is considered to be a healthy condition for most businesses.

The ratio is calculated as follows:

**Current Ratio = Current Assets / Current Liabilities**

The following table shows the current ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 2.48 | 2.95 | 2.73 | 4.34 | 3.87 |
| DESCO | 2.45 | 2.64 | 2.65 | 2.58 | 3.23 |

Figure -12: Current Ratio of PGCB and DESCO for the years 2005-2009

According to Benchmark analysis the current ratio of 2:1 is considered to be ideal for a company. It is well above the benchmark all through the period of 2005-2009. Also its current ratio indicates the solvency power of this company increased over the years. Compare to its rival firm DESCO, PGCB is in far better position in terms of liquidity.

**4.1.2 Quick Ratio**

The Acid-test or quick ratio measures a company's ability to meet its short-term obligations with its most liquid assets. Inventories typically are the least liquid of a firm’s current assets – they are the assets on which require more time to be sold and losses are most likely to occur in the event of liquidation. Therefore, it is important to measure the firm’s ability to pay off short term obligations without having to rely on the sale of inventories. Quick ratio of 1:1 is considered to be a healthy condition for most businesses. It is calculated as follows.

**Quick Ratio= (Current Assets- Inventories)/ Current Liabilities**

The following table shows the quick ratio data of the two companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 2.27 | 2.73 | 2.58 | 4.14 | 3.71 |
| DESCO | 1.99 | 2.15 | 2.37 | 2.39 | 2.24 |

Figure -13: Quick Ratio of PGCB and DESCO for the years 2005-2009

Compared to the benchmark of quick ratio 1:1, PGCB has a huge better quick ratio. Also compared to its rival firm DESCO, it has a good position in quick ratio. This indicates the good ability to meet its short-term obligations with its most liquid assets.

**4.2 Asset Management Ratio**

A set of ratios that measure how effectively a firm manages its assets compared to its sales. These ratios are designed to find out whether the total amount of each type of asset as reported on the balance sheet appear reasonable, too high, or too low considering current and projected sales levels. Asset Management Ratio is done based on inventory turnover ratio, day’s sales outstanding and fixed asset and total asset turnover ratio.

**4.2.1 Inventory Turnover Ratio**

Inventory Turnover Ratio tells how often a business' inventory turns over during the course of the year. Inventories are the least liquid form of asset and a high inventory turnover ratio is generally positive. On the other hand, an unusually high ratio compared to the average for the industry could mean that the business is losing sales because of inadequate stock on hand. The ratio is calculated as follows:

**Inventory turnover ratio= Cost of goods sold /Inventories**

The following table shows the inventory turnover ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 7.78 | 7.18 | 6.56 | 4.58 | 5.62 |
| DESCO | 4.15 | 3.47 | 6.30 | 8.96 | 1.62 |

PGCB has a declined inventory turnover ratio, but all through the years of 2005 – 2009 except 2008, it is in good position comparing to its rival firm DESCO. It indicates there may be some economical condition change but comparing to its rival firm they maintain their good management process for inventories.

Figure -14: Inventory Turnover Ratio of PGCB and DESCO for the years 2005-2009

**4.2.2 Days Sales Outstanding**

The DSO ratio is calculated by dividing accounts receivable by average sales per day which indicates the average length of time it takes the firm to collect its credit sales. It is also called the average collection period, is used to evaluate the firm’s ability to collect its credit sales in a timely manner. DSO is calculated as follows:

**Daily Sales Outstanding (DSO) =Receivables/Average sales per day**

 **= Receivables/ [Annual sales/360]**

The following table shows the DSO data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 131.62 | 97.69 | 84.74 | 84.20 | 84.50 |
| DESCO | 144.28 | 128.97 | 94.91 | 74.02 | 79.33 |

Over the years DSO is decreasing, from 2005 to 2008. In 2009 there is a little increase in DSO but it is not a significant one. So collection policy of the company is getting good by time. Also comparing to rival firm DESCO, DSO is good in 2005-2007. But in 2008 and 2009 DESCO has a better DSO than PGCB. But on the view of PGCB it’s doing well and reduces their DSO over the years, which reflects better credit policy of the company.

Figure -15: Days Sales Outstanding of PGCB and DESCO for the years 2005-2009

**4.2.3 Fixed Asset Turnover Ratio**

Fixed Asset Turnover ratio measures the amount of sales generated for every dollar's worth of fixed assets. The fixed asset turnover ratio is calculated by dividing sale by total fixed assets. It is calculated as follows:

**Fixed Assets Turnover Ratio = Sales/ Net Fixed Assets**

The following table shows the fixed asset turnover ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 0.17 | 0.16 | 0.13 | 0.13 | 0.13 |
| DESCO | 1.21 | 1.15 | 1.04 | 1.23 | 1.33 |

The fixed asset turnover ratio is very lower compare to its comparing firm DESCO. But it is due to their huge investment in fixed asset. And also they maintained a good steady fixed asset turnover ratio, which is good for the company.

Figure -16: Fixed Asset Turnover Ratio of PGCB and DESCO for the years 2005-2009

**4.2.4 Total Asset Turnover Ratio**

Total Asset Turnover ratio measures the amount of sales generated for every dollar's worth of total assets. The total asset turnover ratio is calculated by dividing sale by total assets. It is calculated as follows:

**Total Assets Turnover Ratio = Sales/ Total Assets**

The following table shows the total asset turnover ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 0.16 | 0.16 | 0.16 | 0.10 | 0.10 |
| DESCO | 0.54 | 0.49 | 0.46 | 0.51 | 0.42 |

Compare to DESCO, PGCB has a lower total asset turnover ratio. But they maintained a steady rate this is good. There is a huge investment in fixed asset like plant, machineries etc which significantly increase the total asset also. This is good for the company, though they have lower total asset turnover ratio, but high investment in fixed asset will return a significant benefit in future.

Figure -17: Total Asset Turnover Ratio of PGCB and DESCO for the years 2005-2009

**4.3 Debt Management Ratio**

Debt Management ratios help to evaluate a company's long-term solvency measuring the extent to which the company is using long-term debt. This ratio reflects how effectively a firm is managing its debts. It helps the analyst to determine the extent to which borrowed funds have been used to finance assets and review how well operating profits can cover fixed charges such as interest.

**4.3.1 Debt Ratio:**

The debt ratio indicates how much of a company's assets are provided through debt or the percentage of the firm’s assets financed by creditors. Total debt includes both current liabilities and long term liabilities. Creditors prefer low debt ratios, because the lower the ratio, the greater the cushion against creditor’s losses in the event of liquidation. The owners on the other hand can benefit from leverage because it magnifies earnings, and thus the return to stockholder. But, too much debt often leads to financial difficulty, which eventually might cause bankruptcy. It is calculated as follows:

**Debt Ratio= Total Debt/ Total Assets**

The following table shows the debt ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 81.18% | 79.91% | 77.36% | 76.41% | 75.79% |
| DESCO | 53% | 79% | 76% | 75% | 69% |

Figure -18: Debt Ratio of PGCB and DESCO for the years 2005-2009

Debt ratio is decreasing for PGCB over the years. Though DESCO has a lower Debt ratio but it is nearly same in 2006, 2007 and 2008. But declining debt ratio is good news for PGCB because lower the debt ratio creditor’s losses in the event of liquidation are safer.

**4.3.2 Times Interest Earned (TIE) Ratio:**

The TIE ratio measures the extent to which earnings before interest and taxes (EBIT), also called operating income, can decline before the firm is unable to meet its annual interest cost. Failure to meet this obligation can bring legal action by the firm’s creditor, possibly resulting in bankruptcy. The TIE ratio is computed by dividing earning before interest and taxes (EBIT) by interest charges. It measures the ability of the firm to meet its annual interest payments. The TIE ratio is calculated as follows:

**Time interest earned ratio = EBIT/ Interest charges**

The following table shows the times interest ratio data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 1.22 | 1.62 | 2.57 | 3.27 | 2.76 |
| DESCO | 4.69 | 6.17 | 5.44 | 9.10 | 13.6 |

Figure -19: TIE Ratio of PGCB and DESCO for the years 2005-2009

Over the years DESCO has a strong position in TIE ratio compare to PGCB. But PGCB is improving its TIE ratio from2005 to 2008. In 2009 it is little declined. But the ratio is lower because of its huge investment in fixed asset; there is a huge interest charge against different loan. So this is not a bad news at all.

**4.4 Profitability Ratio**

Profitability ratios show the combined effect of liquidity, asset management, and debt management on operating results. It is the net result of a number of policies and decisions.

**4.4.1 Profit Margin on Sales:**

Profit Margin is the ratio of profitability calculated as net income divided by revenues, or net profits divided by sales. It measures how much out of every dollar of sales a company actually keeps in earnings. Profit margin is very useful when comparing companies in similar industries. A higher profit margin indicates a more profitable company that has better control over its costs compared to its competitors. Profit margin is displayed as a percentage; a 20% profit margin, for example, means the company has a net income of $0.20 for each dollar of sales. It is calculated as follows:

**Profit margin on sales = Net Income/ Sales**

The following table shows the profit margin on sale data of the two companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 14.03% | 21.46% | 24.83% | 31.33% | 22.7% |
| DESCO | 9.96% | 9.21% | 9.84% | 11.10% | 16.40% |

Profit margin on sales is increasing over the period on 2005 to 2008 rapidly for PGCB. In 2009 there is a little fall but still it is high above the comparing company DESCO, like in previous years. This is good news for the company.

Figure -20: Profit margin on sales of PGCB and DESCO for the years 2005-2009

**4.4.2 Return on Asset (ROA):**

Return on Asset (ROA)an indicator of how profitable a company is relative to its total assets. It gives an idea as to how efficient management is at using its assets to generate earnings. It is calculated by dividing a company's annual earnings by its total assets, ROA is displayed as a percentage. Sometimes this is referred to as "return on investment". The ROA after interest and taxes are computed as follows:

**Return on Asset (ROA) = Net Income / Total Assets**

The following table shows the ROA data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 2.24% | 3.43% | 2.48% | 3.13% | 2.70% |
| DESCO | 5.38% | 4.51% | 4.53% | 5.66% | 6.89% |

Figure -21: ROA of PGCB and DESCO for the years 2005-2009

 ROA of PGCB is very low compare to DESCO. The trend shows continuous ups and downs. But this is not a bad news in a sense that PGCB invested huge in fixed asset in some years and also all through 2005 – 2009, which eventually reduce the ROA.

**4.4.3 Return on Equity (ROE):**

Return on Equity (ROE) is the amount of net income returned as a percentage of shareholders equity. It measures a company's profitability by revealing how much profit a company generates with the money shareholders have invested. The return on equity (ROE) is measured as follows:

**Return on Equity (ROE) = Net income / Total Shareholders’ Equity**

The following table shows the ROE data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 10.33% | 13.99% | 11.95% | 13.27% | 11.15% |
| DESCO | 19.36% | 17.86% | 18.62% | 22.58% | 22.04% |

Figure -22: ROE of PGCB and DESCO for the years 2005-2009

The ROE of PGCB is very lower compare to rival company DESCO. There are ups and downs in ROE over the years. But the low rate of ROE is not a bad news all time. It indicates that the common equity is very higher.

**4.5 Market Value Ratio**

The market value ratios represent a group of ratios that relates the firm’s stock price to its earnings and book value per share. These ratios give management an indication of what investors think of the company’s past performance and future prospect. If the firm’s liquidity, asset management, debt management, and profitability ratios are all good then market value ratios will be high which will lead to an increase in the stock price of the company.

**4.5.1 Price/Earning (P/E) Ratio:**

This is the ratio of the price per share to earnings per share. It shows how much investors are willing to pay per dollar of reported profit. It is calculated as follows:

**P/E Ratio = Market Price per Share/ Earnings per Share**

The following table shows the P/E ratio data of the 2 companies-

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Company | 2006 | 2007 | 2008 | 2009 |
| PGCB | 14.69 | 16.98 | 11.71 | 18.45 |
| DESCO | 5.98 | 17.85 | 12.52 | 11.68 |

Figure -23: P/E Ratio of PGCB and DESCO for the years 2006-2009

In 2006 the P/E ratio of PGCB was 14.69, in 2009 it become 18.45. In 2009 comparing to DESCO (P/E ratio is 11.68) is higher. This indicates the demand and trust of this share to the investors. The investors willing to pay 18.45 taka for earning 1 taka profit from the company.

**4.5.3 Book Value per Share:**

Common stockholders' equity is determined on a per-share basis. Book value per share is calculated by subtracting liabilities and the par value of any outstanding preferred stock from assets and dividing the remainder by the number of outstanding shares of stock. It is calculated as follows:

**Book Value per Share=Equity/Number of Shares Outstanding**

The following table shows the Book value per share data of the 2 companies-

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Company | 2005 | 2006 | 2007 | 2008 | 2009 |
| PGCB | 185.67 | 223.10 | 270.21 | 353.82 | 390.01 |
| DESCO | 220.20 | 255.66 | 298.06 | 334.95 | 548.45 |

Figure -24: Book Value per Share of PGCB and DESCO for the years 2005-2009

The book value per share is increasing over the year 2005 to 2009. It’s low comparing with its rival company DESCO. But increasing trend in book value per share is a good indicator for the company. The level of equity is rising over the years

**4.5.4 Market/Book (M/B) Ratio:**

The ratio of a stock’s market price to its book value gives another suggestion of how investors regard the company. Companies with relatively high rates of return on equity generally sell at higher multiples of book value than those with low returns. The formula for Market/Book Value is given below:

**Market /Book Ratio = Market Price per Share / Book Value per Share**

The following table shows the M/B ratio data of the two companies-

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Company | 2006 | 2007 | 2008 | 2009 |
| PGCB | 1.12 | 2.16 | 1.54 | 2.01 |
| DESCO | 1.02 | 3.20 | 2.80 | 2.56 |

Figure -25: M/B ratio of PGCB and DESCO for the years 2006-2009

The M/B ratio is relatively lower for PGCB comparing to its rival company DESCO. DESCO’s M/B ratio is increased from 1.02 (2006) to 2.56 (2009). PGCB’s M/B ratio was 1.12 in 2006 and 2.01 in 2009. So it is good news for the company as it is increased over the year. Which implies trust of investors goes up over the years.

**4.6 Overall Comment on PGCB and DESCO**

From the liquidity analysis both PGCB and DESCO are doing good. PGCB have better liquidity according to the current ratio and quick ratio comparing to DESCO. Good quick ratio indicates the good ability to meet its short-term obligations with its most liquid assets.

From the asset management ratio analysis, it is seen that PGCB have huge inventories. From DSO analysis trend shows that over the years both DESCO and PGCB doing good. They reduce their DSO for 2005 to 2009 continuously. But PGCB has better DSO than DESCO, which indicates a good credit policy of the company.

Both total asset turnover ratio and fixed asset turnover ratio is lower for PGCB comparing to DESCO. From the study it is found that PGCB invested huge in plants, machineries and other fixed assets. Thus formulate a relatively low asset turnover ratio.

From the debt ratio analysis we found that PGCB reduced it debt ratio from 81.18% in 2005 to 75.19% in 2009. All through the study period DESCO has lower debt ratio but in year 2005 it was 53% and by increasing it become 69% in 2009. This declining debt ratio is good news for PGCB because lower the debt ratio creditor’s losses in the event of liquidation are safer.

Profitability analysis show’s that, PGCB has an increasing Profit margin on salesover the years, except little fall in 2009. DESCO also show an increasing trend in Profit margin on sales. But PGCB has a higher Profit margin on salesthan DESCO, which is good for them.

ROA is lower for PGCB than its rival company DESCO over the years 2005- 2009. But its because of huge investment and increase in fixed asset, which will be helpful for company’s future operation. ROE also lower for PGCB than DESCO. This is because of huge common equity.

P/E ratio is higher for PGCB than DESCO. Also PGCB has an increasing trend in P/E ratio, which means improvement in the demand and trust of this share to the investors. Due to high level of equity Book value per share shows an increasing trend over the years.

M/B ratio is lower for PGCB comparing to DESCO but increased from 1.02 (2006) to 2.56 (2009). So it is good news for the company as it is increased over the year. Which implies trust of investors goes up over the years.

Overall the market ratio also show healthy sign as Book value par share and market value ratio show greater competence than the market which cause the company share price to higher.

All this justifies why the market value is a lot higher than the book value of the company.

**Conclusion**

The whole point of the thorough analysis conducted on PGCB Limited was to asses this entity in terms of liquidity, profitability, solvency, cash health, comparison with rival and so on. Accordingly, it would safe to say that PGCB Limited is a company with great potential for the future. It is invested huge in property, plant, machineries and equipment purpose. All through the year it gain goodwill and create investors trust thus increases in the price of market share.