Journal of Trends in Financial and Economics
ISSN: 3007-696X
DOI: https://doi.org/10.61784/jtfe3020

SECTOR-WISE FINANCIAL PERFORMANCE ANALYSIS OF MULTINATIONAL CORPORATIONS LISTED ON THE DHAKA STOCK EXCHANGE

S.K Md. Anik Hassan Rabby[1*], Nashita Mumtahina[2]
[1]Lecturer, Department of Management Studies, Bangladesh University of Professionals, Dhaka. Bangladesh.
[2]Department of Management Studies, Bangladesh University of Professionals, Dhaka. Bangladesh.
Corresponding Author: S.K Md Anik Hassan Rabby, Email: anikhassanrabby@gmail.com

Abstract: This study explores the financial performance of multinational companies listed on the Dhaka Stock Exchange (DSE) using key financial ratios such as Price-to-Earnings (P/E), Price-to-Book (P/B), Dividend Payout Ratio (DPR), and Return on Equity (ROE). It aims to determine whether these companies present better investment opportunities than their domestic counterparts. This study also examines the trend of stock prices during the same period to determine the relationship between these financial ratios and stock price growth. The research uses secondary data collected from the companies' annual and quarterly financial statements and some websites. Specifically, the study involves benchmarking both international and domestic players in the telecommunications, pharmaceutical, cement, food, and allied sectors. The analysis explores that despite having relatively higher P/E and P/B ratios, meaning that the stocks are overpriced, the multinational companies have better dividend payout ratios, ROE, and stock growth than domestic companies. The findings of this paper also reveal that investors on the DSE frequently invest without considering conventional financial ratios, a practice referred to as emotional investing. This research offers valuable insights for investors and fund managers into the factors influencing investment decisions on the Dhaka Stock Exchange, emphasizing the potential benefits of considering multinational companies as viable investment opportunities. This study provides a comprehensive assessment of multinational companies' financial performance on the DSE, contributing to the understanding of investment dynamics in emerging markets.
Keywords: Financial indicators; Multinational companies (MNCs); Dhaka Stock Exchange (DSE); Price-to-Earnings (P/E); Price-to-Book (P/B); Dividend Payout Ratio (DPR)

1 INTRODUCTION

1.1 Background of the Study

Bangladesh is a developing country with a growing economy. It is recognized as one of the greatest untapped growth markets in Asia [1]. As a result, it is attracting many multinational companies to expand their business here. Currently, more than 45 multinational companies are operating in Bangladesh, which has a high impact on the market [2]. Among these MNCs, thirteen are enlisted in the Dhaka Stock Exchange. These are Bata, British American Tobacco, Singer, Grameenphone, Robi, Reckitt Benckiser, Linde, Marico, GlaxoSmithKline, Heidelberg Cement, Lafarge Holcim, RAK ceramics, and Berger Paints [3]. They are performing consistently in Bangladesh's market.
Bata Shoe has been operating in Bangladesh for over fifty years. It is currently the market leader in the shoe industry, with almost sixty percent market share. Its annual shoe sale currently stands at about thirty million pairs [4]. British American Tobacco is the world's most international business, with brands sold in more than 200 countries [5]. It started operating in Dhaka over a hundred years ago, in 1910. It is the current market leader in the tobacco industry [6]. Its stock is the highest-priced stock on the Dhaka Stock Exchange. Grameenphone is the market leader in the telecommunication industry. It has the highest market value in DSE [7]. Reckitt Benckiser is the leader of toilet care products. Linde BD started its business in Bangladesh in 1950. It is the leading industrial gas provider in Bangladesh [8]. Marico is the leader in the hair care product products category. One of its brands, Parachute, has over eighty percent market share in this category [9]. GSK leads the health food drink sector with over ninety percent market share [10]. Lafarge Holcim has the second-highest market share in the cement industry. However, Heidelberg Cement has made the most profit among the listed companies in the cement industry [11]. Berger Paints Bangladesh has been awarded as the best paint brand in Bangladesh for six years in a row. It is the market leader in the paint industry with over forty-eight percent market share [12].
They also perform at a high level in DSE. Five of these thirteen are in the DS30 index, which is the index of the best 30 companies of DSE. This indicates they are successful in the share market as well [13]. Because of their stable performance, investors consider them safe investments, and fund managers consider them smart investments. They are among the highest-priced stocks of DSE and also among the highest dividend providers.
This study aims to explore the Financial Indicators of the multinational companies in the Dhaka Stock Exchange from different sectors. This study will be of good use to the value investors [14]. Mutual fund management companies like the researcher's employee organization VIPB AMCL could use it as a reference when making investment decisions [15]. Also, it will give new insight into the performance of multinational companies in DSE. The findings of this study can

work as an encouraging factor for other multinational companies to join the capital market. Also, by comparing the growth of the stocks with the ratios, this study will indicate if the market cares about the ratios and if the stocks with better ratios are growing better.

1.2 Objective of the Study

1.2.1 Broad objective

The broad objective of the study is to analyses financial indicators of the multinational companies that are being traded in Dhaka Stock Exchange and to find out if they are better for investment than other companies in Dhaka Stock Exchange.

1.2.2 Specific objectives

The specific objective of this study can be stated as:

- To do a sector wise comparison of P/E ratio, P/B ratio, dividend payout ratio, and return on equity of multi-national companies of Dhaka Stock Exchange with other companies of the same sector.
- To do a sector wise comparison of the growth of the multinational company's stock price and to find out if there is any relation between growth and ratios

2 LITERATURE REVIEW

An organization's financial performance is critical for determining its profitability level, risk tolerance, and health, especially in active markets such as the Dhaka Stock Exchange (DSE) [16]. DSE has registered Global Funds with varying dimensionality, and therefore, a sector-wise analysis of money flow trends, correlations, investment decision-making, etc., is highly recommended [17]. This study seeks to examine a few selected financial ratios – price-earnings ratio (P/E), price-to-book value ratio (P/B), dividend payout ratio, and return on equity (ROE) – that are most strongly associated with how the entity is perceived and more significantly, investors' actions regarding the entity [18].
Analyzing ratios or cross-sectional ratios is an essential technique when evaluating a company's financial position [19]. Ratios can be used to forecast financial statements, assess improvements through time, and assess the overall health of an organization [20]. The analysis is intended for a variety of audiences, including investors and lenders, for whom it is particularly useful in aiding their decisions about the provision of credit [21]. Ratios tell a story. Therefore, companies can develop ratio measures over time to be better able to make decisions [22].
Historically, the price-earnings ratio has been a subject of study since time immemorial, and there could be excess profits from conducting a valuation of a company as far back as 1934 [23]. Several studies found that stocks with low price-earnings and price-book ratios are more profitable [24]. A portfolio with a low P/E has earned significant excess returns over a portfolio with a high P/E, as illustrated by the Magnet example [25]. Portfolios with PE multiples below ten generated a return of 131%, while portfolios with PE multiples above twenty generated a return of 71% [26]. Now, different digital AI platforms are used in different industries to find the result of various ratios as well [27,28].
The so-called P/E effect was the result of some biases, such as survivorship and look-ahead biases [29]. Researchers found that the biases affect the P/E ratios and return significantly, but when the biases are removed, there is no correlation between the two [30]. Stock returns explain P/E ratios as low P/E stocks gained 10-11% over high P/E supportive stocks. P/E ratios play a significant role in the decision-making process [31].
The price-to-book ratio is the second most important measure of a company's value, after the price-to-earnings ratio, because it indicates the relationship between a firm's book value and its market value [32]. Growth investors seeking reasonable prices (GARP) are likely to have a lower P/B ratio since such firms are viewed as trading at lower values but have better prospects [33]. P/B ratios can be incorporated with excess returns resulting from better performance to measure productivity levels [34].
In contrast, only earning power and business risk determine a firm's value [35] without taking into consideration dividend policy which is a reason for doubting the relevance of dividends [36]. However, some study reached opposite conclusions regarding the effect of dividends on firm value in relation to shareholders [37]. Market prices are dependent on dividends in the present as well as in the future, and high levels of dividend retention are likely to support superior growth in the future [38].
Return on equity (ROE), an indicator of how efficiently a company converts shareholder investments into profits, is an important performance measure for investors [39]. This ratio ensures that management can translate business expansion into non-equity capital [40]. The factors responsible for the success of growth-oriented stocks found that the best-performing growth stocks had ROEs of not less than 17%, while the leading firms had ROEs of 25%-50% [41].

3 METHODOLOGY OF THE STUDY

3.1 Research Design

This research is conducted using secondary data collected from the financial statements of the companies as well as from various websites. Also, it is based on previous works on similar topics. So, it is secondary research.

3.2 Sampling

All the multinational companies in the Dhaka Stock Exchange have been selected for this analysis. The whole population is part of the analysis. The companies are addressed in this study using their ticker name in DSE. The ticker names are as followed: BATASHOE- Bata Bangladesh, BATBC- British American Tobacco Bangladesh Company, LHBL- Lafarge Holcim Bangladesh Limited, HEIDELBCEM- Heidelberg Cement Bangladesh, SINGERBD- Singer Bangladesh, GLAXOSMITH- GlaxoSmithKline, BERGERPBL- Berger Paints Bangladesh Limited, MARICO- Marico Bangladesh, RECKITTBEN- Reckitt Benckiser Bangladesh, GP- Grameenphone, LINDEBD- Linde Bangladesh.
To select companies other than multinational companies from the sectors, a judgmental sampling technique has been used [43]. Companies with higher market values have been selected. Ten companies including the multinational company/companies have been selected from the food & allied, fuel & power, engineering, pharmaceuticals & chemicals, and miscellaneous sector [44]. The telecommunication, tannery industry, and cement industry sectors have only two, six, and seven companies listed in DSE. So, all of them have been selected for analysis [45].

3.3 Data Analysis Methods Adopted

3.3.1 P/E ratio

P/E is the ratio of the market price of a company's stock to its earnings. It gives the amount of money investors pay to earn a unit [46].

$$P/E = Market\ Value\ Per\ Share / EPS \tag{1}$$

$$Earnings\ Per\ Share\ (EPS) = (Income - Dividends\ on\ Preferred\ Stocks /\ Net\ Average\ Outstanding\ Shares)$$

Lower P/E ratios are better than higher P/E ratios. So, companies will be ranked from lowest to highest. For decision making, suggestions made by Nicholson's study will be used:

- <10% - Low, Very Good
- 10%-20% - Good
- 20%-30% - High, Okay
- >30% - Very High, Bad/

3.3.2 P/B ratio

The Price to Book Ratio - P/B Ratio is used to compare a firm's market to book value and is calculated by dividing price per share by book value per share [47].

$$P/B = Market\ Price\ Per\ Share /\ Book\ Value\ Per\ Share$$
$$Book\ Value\ Per\ Share = (Total\ Assets - Total\ Liabilities) / Number\ of\ Shares \tag{2}$$

Lower P/B ratios are better than higher ones. Companies will be ranked from lowest to highest. For decision making, the following scale will be used:

- <1.0 – Low, Good, potentially undervalued stock
- 1.0-3.0 – Okay, Considerable to value investor
- >3.0 – High, potentially overvalued stock

3.3.3 Dividend payout ratio

The dividend payout ratio is the ratio of the total amount of dividends paid out to shareholders relative to the net income of the company. It is the percentage of earnings paid to shareholders in dividend
Higher dividend payout ratios are better for investors. Companies will be ranked from highest to lowest. For decision making, dividend payout brackets proposed by Ani G will be used which is as below:

- <0% - Loss making
- 0%-35% - Good
- 35%-55% - Healthy
- 55%-75% - High
- 75%-95% - Very High
- 95%- 150% - Unsustainable
- >150% - Very Unsustainable

3.3.4 Growth of stock

Growth of stock indicates how much the stock's price has increased over time. In this study growth percentage will be measured [48].

$$Percetage\ of\ Growth = (Current\ Price - Previous\ Price) /\ Previous\ Price \times 100 \tag{3}$$

3.3.5 Return on equity

Return on equity (ROE) is a measure of the profitability of a business in relation to the book value of shareholder equity. ROE is a true bottom-line profitability metric, comparing the profit available to shareholders to the capital provided or owned by shareholders [47].

$$ROE = Net\ Income/Average\ Shareholders\ Equity \quad (4)$$

Higher return on equity is better than lower ones. So, stocks will be ranked from highest to lowest. In 2017, data compiled by New York University finance professor Aswath Damodaran showed that the average ROE of more than 7,400 US publicly traded firms was 10.38%. So, anything higher than that is good. Based on his study and research done by Investor's Business Daily, the following scale will be used [49]:

○<10% - Low
○10%-17% - Above Average
○17%-25% - Good, Potential Growth Stock
○25%-50% - Good, Potential Winner Stock
○ >50% - High

4 ANALYSIS AND FINDINGS

4.1 Cement Industry

Table 1 Data Analysis of Cement Industry's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
CONFIDCEM	13.95	1	2.19	4	13.55%	6	14.03%	2	34.97%	3
PREMIERCEM	14.35	2	1.71	1	38.68%	5	12.56%	3		
MICEMENT	18.31	3	1.71	1	44.94%	4	9.57%	4	-0.37%	4
HEIDELBCEM	25.22	4	4.31	7	105.56%	2	15.61%	1	35.96%	2
MEGHNACEM	33.33	5	2.67	5	68.73%	3	8.08%	5	-12.53%	5
LHBL	82.90	6	4.19	6	144.93%	1	5.26%	6	60.67%	1
ARAMITCEM	n/a	7	2.06	3	0.00%	7	-22.74%	7	-70.75%	6

Source: Analysis of data collected from annual reports and DSE website

Heidelberg Cement has the fourth lowest p/e ratio in its sector while Lafarge Holcim Bangladesh is ranked sixth in p/e ratio rank (Table 1). Heidelberg Cement's p/e ratio is less than 30, so it is not high. But with a p/e ratio of 82.9, Lafarge Holcim has a very high p/e ratio. So, investors are paying a lot more for a share than the share earns. In the case of the p/b ratio, these two multinational companies have the worst p/b ratios in their sector. Both companies' p/b ratio is over 3. Their p/b ratios are high, and these stocks are potentially overvalued.

The scenario is completely different in terms of dividend payout ratio and percentage of growth. Lafarge Holcim holds the top position in both categories while Heidelberg Cement holds the second place [50]. Both these companies' dividend payout ratio is in the unsustainable area, they are giving away more as dividend than their earning. As for the growth, Lafarge Holcim has grown by almost eighteen percent while Heidelberg Cement has grown slightly.

Heidelberg Cement has the highest return on equity in the cement sector. Its ROE is above average. Lafarge Holcim's return in equity is not so good. With low ROE, it is in second from bottom

4.2 Tannery Industry

Tannery industry has six participants in the DSE. Bata is the only multinational company in this sector. This industry's companies' ratios are as below (Table 2):

Table 2 Data Analysis of Tannery Industry's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
BATASHOE	13.71	1	3.65	5	40.68%	3	29.45%	1	114.50%	3
FORTUNE	16.65	2	2.47	3	0.00%	4	14.88%	2		6
APEXFOOT	45.61	3	1.45	1	68.59%	2	-0.48%	5	42.15%	5
APEXTANRY	48.95	4	1.98	2	135.59%	1	3.99%	4	79.60%	4
LEGACYFOOT	108.56	5	5.27	6	0.00%	4	5.99%	3	476.56%	1
SAMATALETH	n/a	6	3.41	4	0.00%	4	-1.01%	6	253.33%	2

Source: Analysis of data collected from annual reports and DSE website

Bata Shoe has the lowest p/e ratio in the tannery industry. Its p/e ratio is good. But opposite scenario can be seen for its p/b ratio. With a p/b ratio of 3.65, which is higher than three, it is ranked fifth out of the eight companies. Bata has the highest return on equity in this sector. Its ROE is very good, and it indicates that Bata's stock could be a winner in future.

As for the dividend payout ratio and percentage of capital appreciation, it is ranked third in both case [51]. It has a healthy dividend payout ratio. Its share price has gone up by over one hundred percent since January 2013. It is a growth stock.

4.3 Telecommunication Industry

Table 3 Data Analysis of Telecommunication Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
GP	19.09	1	14.91	2	100.94%	1	79.84%	1	130.29%	1
BSCCL	51.50	2	2.69	1	62.18%	2	5.30%	2	-23.77%	2

Source: Analysis of data collected from annual reports and DSE website

There are only two companies listed in DSE from telecommunication industry (Table 3). Grameenphone is ranked top in all but p/b ratios rank. Its p/e ratio is good. But its p/b ratio is very high. The same is true for dividend payout ratio and return on equity. It has a payout ratio of just over hundred percent, which is in the unstable zone. Its return on equity is quite high as well. Grameenphone's stock price has grown quite a lot since January 2013. It has more than doubled, so it can be called a growth stock [52].

4.4 Food & Allied Sector

Table 4 Data Analysis of Food & Allied Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
EMERALDOIL	3.48	1	0.72	1	0.00%	3	20.78%	3		
GHAIL	20.00	2	1.9	5	0.00%	3	8.70%	5		
BATBC	25.83	3	8.84	8	45.98%	2	37.29%	1	276.56%	2
OLYMPIC	26.95	4	8.23	7	54.74%	1	33.05%	2	138.43%	3
FUWANGFOOD	27.25	5	1.72	4	0.00%	3	5.77%	7	-25.40%	6
RDFOOD	28.31	6	1.09	2	0.00%	3	3.60%	8	-39.05%	7
FINEFOODS	54.31	7	3.23	6	0.00%	3	5.87%	6	96.11%	5
MEGCONMILK	n/a	8	n/a	10	0.00%	3	20.09%	4	136.84%	4
BEACHHATCH	n/a	9	1.15	3	0.00%	3	-3.48%	9	-49.19%	8
RAHIMAFOOD	n/a	10	60.43	9	0.00%	3	-6.86%	10	876.57%	1

Source: Analysis of data collected from annual reports and DSE website

British American Tobacco Bangladesh Company has p/e ratio of just over twenty-five, which is okay (Table 4). But its p/b ratio is very high. It has one of the worst p/b ratios in its sector. But it has the highest return on equity in its sector. Its ROE is within the range of 25%-50%, so it is potentially a winner.

BATBC is ranked second in both dividend payout ratio and growth percentage. It has a healthy dividend payout ratio. It has grown over two hundred and seventy-five percent in the last five so years. It indicates that it is a growth stock [53].

4.5 Fuel & Power Sector

Among the 19 companies listed in DSE from the fuel & power sector, Linde BD is the only multinational company. The selected ten companies' ratios are as below (Table 5):

Table 5 Data Analysis of Fuel & Power Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
TITASGAS	7.56	1	0.59	2	42.97%	7	7.99%	8	-41.72%	7
SUMITPOWER	10.13	2	1.34	5	79.79%	3	24.33%	3	-27.43%	6
BARKAPOWER	10.72	3	1.31	4	19.01%	10	17.45%	7	-13.50%	5
POWERGRID	10.92	4	0.52	1	34.64%	8	5.20%	9	-10.59%	4
KPCL	13.59	5	2.69	6	108.48%	2	19.94%	5	39.76%	2
MJLLBD	14.69	6	2.92	8	65.12%	5	21.48%	4	18.85%	3
SPCL	15.45	7	2.77	7	25.48%	9	19.51%	6		
LINDEBD	19.78	8	5.13	9	54.31%	6	27.77%	2	131.35%	1
UPGDCL	25.94	9	8.17	10	78.26%	4	30.50%	1		
DESCO	95.91	10	1.14	3	227.27%	1	1.18%	10	-42.82%	8

Source: Analysis of data collected from annual reports and DSE website

Linde Bangladesh is ranked eighth in the p/e ratios rank and ranked ninth in p/b ratio's rank. But the average p/e ratio of the fuel and power sector is low. As a result, despite ranking so low, Linde BD's p/e ratio is good. But its p/b ratio is very high. It is in the middle in the dividend payout ratio's rank. Its dividend payout ratio is healthy. Linde's return on equity is also very good. With a ROE of 27.77%, it is ranked behind Uniter Power Generation & Distribution Company Ltd. Linde has grown by over one hundred percent since January 2013. It is the best in its sector.

4.6 Pharmaceuticals and Chemicals Sector (Table 6)

Table 6 Data Analysis of Pharmaceuticals & Chemicals Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
KEYACOSMET	4.13	1	0.66	2	0.00%	9	13.96%	6	-72.96%	8
ACTIVEFINE	8.70	2	1.51	6	0.00%	9	14.16%	5	-60.19%	7
ORIONPHARM	12.26	3	0.62	1	44.12%	6	5.54%	9		
ACMELAB	14.24	4	1.17	3	52.95%	5	8.24%	8		
BXPHARMA	16.87	5	1.48	5	22.77%	7	8.88%	7	56.68%	5
SQURPHARMA	18.39	6	4.28	7	22.57%	8	23.74%	4	64.86%	4
RECKITTBEN	22.29	7	39.79	10	97.98%	4	125.27%	1	139.28%	3
MARICO	25.25	8	23.02	9	109.36%	2	87.58%	2	178.19%	1
GLAXOSMITH	25.48	9	6.43	8	98.99%	3	24.93%	3	158.21%	2
BEACONPHAR	40.44	10	1.39	4	111.11%	1	2.08%	10	16.67%	6

Source: Analysis of data collected from annual reports and DSE website

4.7 Engineering Sector

The three multinational companies in the pharmaceuticals and chemicals industry ranked poorly in the p/e, and p/b ratio's rank. They have the three highest p/b ratios in this sector, while only Beacon Pharma has higher p/e ratio than these three companies. All these three MNCs have p/e ratio between twenty and thirty, which is okay but not good. But their p/b ratio is very high. Especially Marico, and Reckitt Benckiser's p/b ratio is very high compared to the other companies in the sector. But for the other two ratios, and growth percentage, the scenario is completely different.

Reckitt Benckiser, Marico, and GlaxoSmithKline holds the top three positions in return on equity as well as growth percentage's rank. They also hold three out of top four ranks in the dividend payout ratio's ranking. Marico has a very high dividend payout ratio which can be described as unsustainable. Its return on equity is very high as well. Its price has doubled and grown some in the study period. So, it can be described as a growth stock. Reckitt Benckiser also has an unsustainable dividend payout ratio and very high return on equity. Its stock price has increased by almost 140% in the same period. GlaxoSmithKline also has an unsustainable dividend payout ratio like the other two. But it has a good return on equity ratio which indicates a potentially growth in stock. Its price has also increased greatly in this period. Like the other two in this sector, it is also a growth stock according to its growth percentage (Table 7).

Table 7 Data Analysis of Engineering Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
APOLOISPAT	9.19	1	0.61	2	0.00%	8	6.23%	9		
BBS	10.79	2	2.11	6	17.12%	6	19.91%	2		
OAL	12.99	3	1.10	4	0.00%	8	8.18%	6		
BSRMSTEEL	14.50	4	2.12	7	70.28%	2	15.34%	4	6.33%	2
WMSHIPYARD	14.63	5	1.00	3	14.02%	7	6.45%	8		
IFADAUTOS	16.47	6	4.21	9	31.16%	3	17.46%	3		
SINGERBD	18.84	7	6.30	10	102.15%	1	35.78%	1	13.41%	1
GPHISPAT	20.38	8	2.41	8	27.32%	4	11.59%	5	-23.25%	3
BSRMLTD	25.15	9	1.93	5	25.77%	5	7.14%	7		
GOLDENSON	n/a	10	0.44	1	0.00%	8	-5.33%	10	-80.94%	4

Source: Analysis of data collected from annual reports and DSE website

Singer Bangladesh has a good p/e ratio. But still it is ranked seventh in the p/e ratios rank. These sector's p/e ratios are good. Singers have the highest p/b ratio in their sector. Its p/b ratio is not good. But in the other three categories, it holds the top position.

Singer's dividend payout ratio is over one hundred percent. So, it is giving more dividend than their earning. This ratio is unsustainable. Its return on equity is very good. This ratio indicates it can be a winner stock. Their stock price has increased by just over thirteen percent in the study period. Most of the stocks in this sector was listed after January 2013.

4.8 Miscellaneous

Table 8 Data Analysis of Miscellaneous Sector's Companies

Name	P/E	Rank	P/B	Rank	DPR	Rank	ROE	Rank	% Growth	Rank
AMANFEED	12.42	1	1.73	7	44.05%	5	13.95%	2		
NFML	12.88	2	1.16	4	0.00%	7	8.31%	3		

BERGERPBL	17.08	3	11.47	9	77.82%	2	45.26%	1	157.02%	2
KBPPWBIL	20.62	4	1.42	6	0.00%	7	6.39%	4		
BEXIMCO	20.70	5	0.36	1	38.76%	6	1.71%	7	-58.92%	6
MIRACLEIND	37.20	6	1.16	4	0.00%	7	2.91%	6	252.27%	1
SINOBANGLA	38.36	7	2.39	8	62.89%	3	6.24%	5	123.44%	3
GQBALLPEN	64.34	8	0.68	2	60.24%	4	0.94%	8	-33.83%	5
BSC	67.74	9	0.77	3	161.29%	1	0.81%	9	-84.56%	7
USMANIAGL	n/a	10	17.14	10	0.00%	7	-43.04%	10	76.03%	4

Source: Analysis of data collected from annual reports and DSE website

As this is the miscellaneous sector (Table 8), the companies in this sector are versatile. But Berger Paints Bangladesh's performance is good comparing to the other companies in this versatile sector. Its P/E ratio is good. But its P/B ratio is very high. A P/B ratio of 11.47 is not at all desirable to investor. As for the dividend payout ratio of 77.82%, it is very high. It has the best return on equity in its sector and it is a good one as well. Its growth is also very good, which indicates it is a growth stock.

5 DISCUSSION

The ratios and growth percentage give mixed signals about the performance of multinational companies in DSE. They are mostly ranked in the bottom half in the p/e and p/b ratios rank [54]. However, they hold the top places in the dividend payout ratio, return on equity, and growth percentage rank. Though the multinational companies have comparatively higher p/e ratios than the other companies in their sector, their p/e ratios are not bad [55]. Only Lafarge Holcim has a high p/e ratio. Five of them have a good p/e ratio, and five of them have an okay p/e ratio [56]. While in all sectors but one, they have the leading rank in dividend payout ratio, return on equity, and growth rank. In the cement industry, the company with the best p/e ratio is ranked three in the growth rank, while the one ranked last has seen the best growth [57]. The companies with better p/b ratios are ranked in lower positions, while the worst two ratio holders have seen the best growth.

The scenario is similar in the tannery industry as well [58]. The companies with the worst p/e ratios have seen the best growth. However, other than that, there is no pattern. No similarities can be seen between the other ratios [59]. Only two companies are in the telecommunication industry, and GP holds the best position in all but the p/b ratio's rank. In the food and allied sector, Rahima Food is ranked tenth and ninth in the p/e and p/b ratio rank, but it has seen the most growth [60]. However, the best ratio holders do not have the worst rank. So, no significant relation in there as well.

In the fuel and power industry, no visible pattern can be found [61]. No relation can be seen between ratios and growth. The same is true for the pharmaceuticals and chemicals industry. The engineering sector is also similar [62]. The worst p/e ratio holder has the worst roe and is in fourth place of growth, while the best p/e ratio holder has the second worst ROE [63]. The miscellaneous sector consists of all the companies that do not belong to any other sector. As expected, no pattern is visible in this sector as well. Throughout this study, no clear relationship has been found in analyzing the ranks [64]. Previous studies have indicated that the Dhaka Stock Exchange needs to operate rationally. It could be more effective. Rather, the investors here invest based on their emotions and judgment, and the investment pattern follows a random walk pattern. This study also finds similar results. This study indicates that investors do not invest based on ratios due to proper knowledge and lack of training [65]. The market does not operate rationally; investors invest based on their emotions rather than based on the company's performance.

6 CONCLUSION

The four ratios used in this study indicate the performance of a stock from various angles. P/E ratio compares the price to earnings, P/B ratio compares price to book value of equity. Dividend payout ratio indicates how much of its income is the companies paying out as dividend. Return on equity gives an idea about how effectively equity holders' investments are used by the company. Previous studies have found that the low P/E and P/B ratio is good for the company as well as the investors, while high dividend payout ratio and return on equity are better. Using their study as benchmark, this study has found that most multinational companies' performance can be described as okay or bad if we consider only the p/e, and p/b ratio but it can be described as good when dividend payout ratio or return on equity is considered. But the main indicator for investors would be how they have grown in the last few years. And this study shows that they have grown quite a lot. Most of them can be described as growth stock. The three indicators, dividend payout ratio, return on equity, and growth leads to the conclusion that multinational companies can be described as smart investment. The value investors are right to consider these stocks as smart investment. As for the market, DSE is not an efficient market according to this study. Ratios do not have significant impact on growth.

COMPETING INTERESTS

The authors have no relevant financial or non-financial interests to disclose.

REFERENCES

[1] Akanda NI, Hossain MA, Fahad MMI, et al. Cost-effective and user-friendly vehicle tracking system using GPS and GSM technology based on IoT. Inst Adv Eng Sci (IAES), 2022, 28(3): 1826-1833. DOI:10.11591/ijeecs.v28.i3.pp1826-1833.

[2] Muresan E, Wolitzer P. Organize your Financial Ratios Analysis with PALMS. RELX Group (Netherlands), 2003. DLI: https://doi.org/10.2139/ssrn.375880.

[3] Basu M, Ghosh K. From normative to 'AI First' finance: A conceptual review. 2023.

[4] Block FE. A study of the price to book relationship. Taylor & Francis, 1995, 51(1): 63-73. DOI:10.2469/faj.v51.n1.1860.

[5] Shkalenko AV, Nazarenko AV. Integration of AI and IoT into Corporate Social Responsibility Strategies for Financial Risk Management and Sustainable Development. 2024. DOI: https://doi.org/10.20944/preprints202404.0804.v1.

[6] Brown J. What is a good payout ratio for dividend stocks. 2018.

[7] Black F. The pricing of commodity contracts. Journal of financial economics, 1976, 3(1-2): 167-79.

[8] Hasan MM. Sector-Wise Stock Return Analysis: An Evidence from Dhaka Stock Exchange in Bangladesh. Int J Bus Manag, 2011, 6(6). DOI: 10.5539/ijbm.v6n6p276.

[9] Damodaran A. Investment valuation. New York (NY): Wiley Finance, 2002.

[10] Habib MA, Alam MZ. Business Analysis of Pharmaceutical Firms in Bangladesh: Problems and Prospects. J Bus Technol, 1970, 6(1): 61-77. DOI: 10.3329/jbt.v6i1.9995.

[11] Gordon MJ. Dividends, earnings, and stock price. Rev Econ Stat, 1959, 41(2): 99-105.

[12] Folger J. Stock-picking strategies: Growth investing. Investopedia. 2018. https://www.investopedia.com/university/stockpicking/stockpicking4.asp.

[13] Ives MI. Financial Statement Analysis. 2020. https://www.taylorfrancis.com/chapters/edit/10.1081/E-EPAP3-120043335/financial-statement-analysis-martin-iv.

[14] Hermuningsih S. Profitability, growth opportunity, capital structure and the firm value. Bus Econ Manag, 2014, 16(2): 115-136. DOI: 10.21098/bemp.v16i2.440.

[15] Karethio EN. The effect of dividend payout ratio on financial performance of companies listed in the Nairobi Securities Exchange . 2013.

[16] Cao L. AI in Finance: Challenges, Techniques, and Opportunities. Assoc Comput Machinery, 2022, 55(3): 1-38. DOI: 10.1145/3502289.

[17] Oberholzer M. The relative importance of financial ratios in creating shareholders' wealth. AOSIS, 2012, 15(4): 416-428. DOI: 10.4102/sajems. v15i4.167.

[18] Parsian H, Koloukhi AS. A study on the effect of free cash flow and profitability current ratio on dividend payout ratio: Evidence from Tehran Stock Exchange. Growing Science. 2013, 63-70. DOI: 10.5267/j.msl.2013.11.033.

[19] Nathan S, Sivakumar K, Vijayakumar J. Returns to Trading Strategies Based on Price-to-Earnings and Price-to-Sales Ratios. Euromoney Institutional Investor, 2001, 10(2): 17-28. DOI: 10.3905/joi.2001.319458.

[20] Global Cement Market Report 2018-2023. 2018. https://www.prnewswire.com/news-releases/global-cement-market-report-2018-2023-largest-players-are-lafarge-holcim-anhui-conch-jidong-development-and-heidelberg-cement- 300635392.html.

[21] Baker HK, Farrelly GE, Edelman RB. A survey of management views on dividend policy. Financial management, 1985: 78-84.

[22] Roberts GB. The Price-Earnings Ratio as an Index of Stock Prices. J Fin, 1929, 24(165): 21-21. DOI: 10.2307/2277003.

[23] Mahesh DM, Prabhakaran M. Valuation of select companies in cement industry listed in National Stock Exchange Limited based on market capitalization. IJITEE, 2019, 8(12): 2007-2011. DOI: 10.35940/ijitee. l2918.1081219.

[24] Seetharaman A, Nagarajan S, Patwa N, et al. The Emergence of Growth Equity as a Private Class of Asset. Afr J Bus Manag, 2018, 7(4): 98-98. DOI: 10.5430/afr.v7n4p98.

[25] Anderson K, Brooks C. Extreme returns from extreme value stocks. Euromoney Inst Invest, 2007, 16(1): 69-81. DOI:10.3905/joi.2007.681825.

[26] Baird G, Dodd J, Middleton L. A growth-adjusted price-earnings ratio. Cornell University, 2020. DOI: https://doi.org/10.48550/arxiv.2001.08240.

[27] Giorgianni ML. Foreign exchange risk premium: does fiscal policy matter? Evidence from Italian data, International Monetary Fund, 1997.

[28] Giorgianni G, Ali MN, Jebbor I, et al. Unveiling the Potential of AI: Impacts on Industries and Ethical Considerations. Educ Adm Theory Pract, 2024, 30(3): 2654-2661. DOI: 10.53555/kuey.v30i3.7484.

[29] Banz RW, Breen M. Sample-dependent results using accounting and market data: Some evidence. J Finance, 1986, 41(4): 779-793.

[30] Eldomiaty TI, Atia O. Market Risk-Adjusted Dividend Policy and Price-to-Book Ratio. RELX Group. 2012. DOI:10.2139/ssrn.2188548.
[31] Pietrovito F. Investment decisions, price-earnings ratios, and finance: Evidence from firm-level data. 2008. https://pdfs.semanticscholar.org/1aab/41ad11208393d62f8c3e5c74b2e2f0f863a2.pdf.
[32] Indhumathi G, Ramkumar RG, Selvam M. Analysis of sectoral market efficiency: A study on banking sector. SSRN, 2011. DOI: 10.2139/ssrn.1940886.
[33] Estrada J. Adjusting P/E ratios by growth and risk: the PERG ratio. Emerald Publ Ltd, 2005, 1(3): 187-203. DOI:10.1108/17439130510619631.
[34] Folger J. Stock-picking strategies: Growth investing. Investopedia. 2018. https://www.investopedia.com/university/stockpicking/stockpicking4.asp.
[35] Rahman MT, Moazzem KG. Capital Market of Bangladesh: Volatility in the Dhaka Stock Exchange (DSE) and Role of Regulators. Int J Bus Manag, 2011, 6(7): 86-94. DOI: 10.5539/ijbm.v6n7p86.
[36] Purwanto P, Bina CR. Analysis of Financial Ratio towards Earning Growth in Mining Companies. UJI Business Management, 2016, 4(3): 81-87. DOI: 10.13189/ujibm.2016.040301.
[37] Rabby MA, Rahman M. Consumer Observation on Retail Digitalization: A Study on Retail Sector of Bangladesh. Int J Res Publ Rev, 2023, 4: 776-787.
[38] Pietrovito F. Investment decisions, price-earnings ratios, and finance: Evidence from firm-level data. 2008. https://pdfs.semanticscholar.org/1aab/41ad11208393d62f8c3e5c74b2e2f0f863a2.pdf.
[39] Rabby SMAH, Rahamn MAA. Comprehensive Review on Expatriate Training and It's Importance. Int J Prog Res Eng Manag Sci, 2023, 3(2): 90-98.
[40] Kumar R, Jha PK. Determinants of corporate dividend policy in India - a study of listed IT companies at BSE. RELX Group (Netherlands), 2012. DOI: 10.2139/ssrn.2258333.
[41] Seetharaman A, Nagarajan S, Patwa N, et al. The Emergence of Growth Equity as a Private Class of Asset. Afr J Bus Manag, 2018, 7(4): 98-98. DOI: 10.5430/afr.v7n4p98.
[42] Ma T, Lee K, Lai C, et al. Rational or irrational? A comprehensive study on stock market crashes. RELX Group (Netherlands), 2017. DOI: 10.2139/ssrn.2905555.
[43] Investor Guide Staff. Stock strategies: Understanding GARP stock investing strategy. 2002.
[44] Kabir EB, Rabby SMAH. Self-efficacy as a predictor of cyberloafing: The role of mastery experience, vicarious experience, verbal persuasion, and physiological states. 2023.
[45] Akhter S, Kabir R, Sarkar AH. Risk disparity among conglomerates and single entities in the Dhaka Stock Exchange. Can Cent Sci Educ, 2012, 8(2). DOI:10.5539/ijbm.v8n2p50.
[46] Bearer W. Financial ratios as predictors of failure. J Account Res, 1966, 4(3): 71-102.
[47] Basu S. Investment performance of common stocks in relation to their price-earnings ratio: A test of the efficient market hypothesis. J Finance, 1977, 32(3): 663-682.
[48] Besley S, Brigham EF. Essentials of managerial finance. Mason, OH: Thomson/South-Western, 2015.
[49] Lau KC. A simple guide to return on equity. FifthPerson, 2014. https://fifthperson.com/a-simple-guide-to-return-on-equity/.
[50] Baafi AB. Multinational corporations and the developing world. Ghana Web, 2009.
[51] Babul M. Listed MNCs witness mixed price trend in 2017. The Financial Express. 2018. https://thefinancialexpress.com.bd/stock/bangladesh/listed-mncs-witness-mixed-price-trend-in-2017-1515040634.
[52] Babul M. Listed MNCs witness mixed price trend in 2017. The Financial Express. 2018. https://thefinancialexpress.com.bd/stock/bangladesh/listed-mncs-witness-mixed-price-trend-in-2017-1515040634.
[53] British American Tobacco Bangladesh Company. About us. 2018. http://www.batbangladesh.com/group/sites/BAT_9T5FQ2.nsf/vwPagesWebLive/DO9T5K3S?opendocument.
[54] Drakopoulou V. A review of fundamental and technical stock analysis techniques. J Stock Forex Trading, 2015, 5(163). DOI:10.4172/2168-9458.1000163.
[55] Lau KC. A simple guide to return on equity. FifthPerson, 2014. https://fifthperson.com/a-simple-guide-to-return-on-equity/.
[56] Koi-Akrofi GY. Profitability analysis of the telecommunications industry in Ghana from 2002 to 2006. Am J Bus Manag, 2013, 5(1): 60-76. DOI: 10.19026/ajbm.5.5814.
[57] Muresan E, Wolitzer P. Organize your Financial Ratios Analysis with PALMS. RELX Group (Netherlands). 2003 https://doi.org/10.2139/ssrn.375880.
[58] Rabby AH. Women Empowerment through Integrated Development Approach: A Case Study on Poverty Eradication Program (PEP). J Judikaltura, 2024, 2(2): 15-32. DOI: 10.61963/jkt.v2i2.106.
[59] Arianto H, Kurniasih A. The influence of financial performance and macroeconomic factors on the financial distress of textile and garment companies listed on the stock exchange: Empirical studies in Indonesia. Eur Organ Nucl Res, 2023. DOI:10.5281/zenodo.8154773.

[60] Koi-Akrofi GY. Profitability analysis of the telecommunications industry in Ghana from 2002 to 2006. Am J Bus Manag, 2013, 5(1): 60-76. DOI: 10.19026/ajbm.5.5814.

[61] Azam MQ, Alam MA. Financial ratios and analysis of Tata Motors. 2020: 17-31. DOI:10.36713/epra5462.

[62] Taleghani M, Taleghani A. The Analysis and Evaluation of Profitability in Accepted Companies in Tehran Stock Exchange with ROA and ROE Approaches in Industrial Companies. Int J Res Dev Technol, 2021, 10(2): 38-45. DOI: 10.54380/ijrdetv10i106.

[63] Barnhart C, Dwyer GP. Returns to investors in stocks in new industries. Wiley, 2011, 50(4): 1031-1039. DOI:10.1111/j.1465-7295.2011.00395.

[64] Shkalenko AV, Nazarenko AV. Integration of AI and IoT into Corporate Social Responsibility Strategies for Financial Risk Management and Sustainable Development. 2024 DOI: https://doi.org/10.20944/preprints202404.0804.v1.

[65] Lau KC. A simple guide to return on equity. FifthPerson, 2014. https://fifthperson.com/a-simple-guide-to-return-on-equity/.