Efficiency of Financial Ratios Analysis for Evaluating Companies' Liquidity

Chnar Abdullah Rashid[1,2]

[1]Sulaimani Polytechnic University, Sulaimani, Iraq
[2]Cihan University, Sulaimani, Iraq
Correspondence: Chnar Abdullah Rashid, Sulaimani, Iraq.
Email: chnar.rashid@spu.edu.iq

Received: January 5, 2018 Accepted: February 24, 2018 Online Published: March 1, 2018

doi: 10.23918/ijsses.v4i4p110

Abstract: This research mainly focused on the evaluation of the companies' liquidity by using financial ratios analysis. One of the UK retail company has selected to be evaluated through analyzing their data which is available on their financial statements. Potentially, cash flow statement of this company has considered to be used for evaluating liquidity, because most of the important information for this purpose can be found in this statement. A hypothesis has been developed in which financial ratios analysis can help the investors to choose the company for purchasing their shares and it has been approved because the numbers indicated that liquidity is important as much as profit for attracting investors to purchase the company's share owing to providing confidentiality for the company. More information has proposed in this research.

Keywords: Financial Ratios Analysis, Liquidity, Liquidity Ratios, Current Ratio, Quick Ratio

1. Introduction

Since effective planning and financial management become the keys to running a financially successful small business, lenders and investors rely on financial ratios analysis for making decision on lending and investment. Financial ratios analysis is important for understanding financial statements, identifying movements and developments and measuring the overall business's financial state, particularly in identifying positive and negative financial trends. Thus, it is important for the investors and shareholders to evaluate the companies' position regarding to liquidity by using financial ratios analysis in order to know whether having a lot of liquid for a company is crucial or not, because being liquid means controlling obligations, on the other hand means lack of investment.

Liquidity ratio can be considered as one of the financial ratios which can be utilized for measuring the company's ability to meet its short term debt obligations. A result of liquidity ratios can be found by dividing cash and liquid assets by short term borrowings and current liabilities. Consequently, the number of times that the short term debt obligations are covered by the cash and liquid assets can be shown. The short term obligations will be fully covered when the value is greater than 1 which means the company is in a good financial situation and it is less likely to face financial difficulties.

There are many studies on financial ratios, precisely on liquidity ratio in various countries. Saleem and Rehman (2011) found that profitability and liquidity ratios play an important role in the financial positions of enterprises. Olagunju, Adeyanju and Olabode (2011) discovered that there is significant relationship between liquidity and profitability in commercial banks, which means profitability is significantly influenced by liquidity and also oppositely. Bolek and Wolski (2012) indicated that a higher level of liquidity, with market value in Warsaw Stock Exchange shows that investors prefer companies to maintain high levels of cash. Companies from investors' point of view should be profitable and liquid on the level of cash to meet the opportunities on the market. Avramov, Chordia and Goyal (2006) found that liquidity facilitates efficiency, in the sense that the market's capacity to accommodate order flow is larger during periods when the market is more liquid.

One of the problems for the investors is lack of information about company's financial position. Most of them might focus on the profitability whereas liquidity has its own impact on the company's share price as well. One of the common capital structure is capital = debt + equity, if the company cannot cover its debt they will face difficulties to meet its obligations. Consequently, they will fall into the bankruptcy risk if the debt is equal to or more than equity. Hence, even if the debt is less than equity, and the company steal has difficulty to cover its obligations, they will absolutely face financial difficulties and consequently result in influencing share price negatively.

A different role of liquidity has been explored in this paper. The hypothesis considered that analyzing liquidity ratio to evaluate the company's liquidity plays a significant role in choosing the best alternatives among available investment options. Thus, the purpose of this study is to evaluate the companies' ability to meet their short term obligations and making investments appropriately. One of the UK Company's financial statements has been used to evaluate its liquidity by analyzing liquidity ratios. This research discovered that this company has not had any liquidity problem through evaluating its current ratio but somehow it has some difficulties according to its quick ratio in years (2012, 2013 and 2016). Hence, they do not have enough cash to pay their liabilities but having a small amount of cash means that the company invests very well.

2. Literature Review

2.1 Financial Ratios Analysis

Financial ratios can be seen as useful tools to serve companies and investors for the process of analyzing and comparing relationships between different pieces of financial information across the company's history. They illustrate what has occurred during a particular time. However, what will occur in the future is more concerned by most of the financial statements users (Noreen, Brewer, & Garrison, 2011). For instance, company's future capability to recover its obligations is concerned by creditors and company's future earnings, dividends by stockholders, company's profitability by investors and assessing overall company's efficiency by managers (Altman, 1968). While, financial statements naturally are historical, still they can provide useful information for the users regarding to financial matters (Edmister, 1972). Owing to figures which are taken from a company's income statement, balance sheet, and cash flow statement allow analysts to calculate and evaluate several types of financial ratios for different purposes (Altman, 1968).

These users depend on the financial ratios analysis to examine the company's future predictions and financial condition (Noreen, Brewer, & Garrison, 2011). For instance, profitability, risk analysis and growth analysis are primary objectives for equity investors, while liquidity and solvency are main objectives for creditors. Hence, operating performance, profitability and solvency are most concerning objectives for managers (Noreen, Brewer, & Garrison, 2011).

2.2 The Concept of Liquidity

Liquidity can be seen as a financial concept which means the amount of money which has to be available for investment (Olagunju, David, & Samuel, 2012; Acharya, Afonso & Kovner, 2017). This money is more likely to be credit rather than cash in today's investment (Chordia, Roll & Subrahmanyam, 2008; Bolek & Wolski, 2012).

This financial term became a source of worry for the companies' manager about their future's uncertainty (Saleem & Rehman, 2011). That's due to preferring borrowed money by a number of the financial organizations to operate most of their investments (Boudoukh, & Whitelaw, 1993). When the interest rates are low, liquidity will be high which means there is a lot of capital that can be easily available (Brunnermeier & Pedersen, 2008; Allen & Gale, 2017). With this concept, it can be assumed that high liquidity motivates growing economics (Brunnermeier, & Pedersen, 2008; Hurst, & Lusardi, 2004). The reason is when the interest rates are low, the credit will be cheap (Brunnermeier, & Pedersen, 2008). Thus, investors are more likely to borrow (Brunnermeier, & Pedersen, 2008; Allen, & Gale, 2017). In this circumstance the return on investment need to be higher than the interest rate only. Therefore, more investments look good (Huberman, & Halka, 2001; Saleem, &Rehman, 2011).

Liquidity can be defined as a business organization's condition to determine its ability to meet its growing obligations which consists of long term debt and current liabilities (Olagunju, David, & Samuel, 2012; Guerrieri & Lorenzoni, 2017). Measuring cash asset or other relative amount of asset which can be easily converted into cash without losing value to cover short term liabilities can be seen as liquidity as well (Chen & Lu, 2017; Lagos, Rocheteau & Wright, 2017). Liquid assets are consisted of cash and bank balances, debtors and marketable securities (Olagunju, David, & Samuel, 2012; Fong, Holden & Trzcinka, 2017).

Liquidity can help companies to avoid certain situation such as selling assets at distressed prices in order to force them to provide liquidate, paying extra fees to the lawyers and bankruptcy as well which means as much as liquidity increases the probability of bankruptcy is reduced (Castiglionesi, Feriozzi & Lorenzoni, 2017; Schwarz, 2017). Consequently, the time to convert asset into cash and the certainty degree associated with this conversion can be viewed as a two important dimensions of liquidity (Olagunju, David, & Samuel, 2012).

2.3 Liquidity Measurement

Liquidity ratios are utilized to measure the firm's ability to meet its current obligations (Bolek, 2012; Chen & Lu, 2017). Traditionally, liquidity ratios consist of current ratio (CR), quick ratio (QR), and acid test (AT) (Olagunju, David, & Samuel, 2012). A good liquidity position will be confirmed by

achieving a high level of these ratios through keeping current assets (CA) to be high or current liabilities (CL) to be low (Bolek & Wolski, 2012; Chen & Lu, 2017).

The current assets consist of cash and those assets which convert into cash in a short time which include marketable securities, receivables, inventories, and prepared expenses (Boudoukh & Whitelaw, 1993). However, current liabilities compose all obligations maturing within a year. They include accounts payable, bills payable, note payable, accrued expenses and tax liability (Olagunju, David, & Samuel, 2012; Boudoukh & Whitelaw, 1993). Measuring liquidity by current ratio involves problem in which this ratio is only testing the quantity of the assets not the quality (Olagunju, David, & Samuel, 2012; Boudoukh & Whitelaw, 1993; Chang, 2017). Hence, current ratio provides the capability of the firm's liquidity roughly not reveals the real position of the firm's liquidity (Bolek & Wolski, 2012; Chen & Lu, 2017).

Another ratio for measuring liquidity is quick ratio, which provides the relationship between liquid assets and current liabilities (Grossman & Miller, 1988). This ratio can be calculated by dividing quick asset by current liabilities. Quick asset is equal to current asset minus inventories, which can be converted into cash directly without losing their value (Adebayo, David & Samuel, 2011; Grossman & Miller, 1988). I expressed inventory and R receivables. The following equations are expressed the liquidity ratios: (Adebayo, David & Samuel, 2011; Grossman & Miller, 1988).

1) CR = CA / CL
2) QR = CA – I / CL
3) AT = CA – I – R / CL

Another liquidity indicator is the cash conversion cycle (CCC) which provides dynamic insights. According to Richardson and Laughlin (1980) the CCC can be defined as the sum of the receivables conversion period (RCP) and the inventory conversion period (ICP) minus the payment deferral period (PDP), which is:

CCC = RCP + ICP – PDP

Where:

RCP = receivables conversion period = accounts receivable turnover / 360

ICP = inventory conversion period = inventory turnover / 360

PDP = payment deferral period = accounts payable turnover / 360

Thus, low level of cash conversion cycle means the firm can quickly recover cash from its production's sales. Hence they will have more cash and they will be more liquid. If the firm's CCC is high, this will indicate a liquid problem which means the company recovers cash in a long period (Bolek & Wolski, 2012; Schwarz, 2017).

Adebayo, David and Samuel (2011) argued that the liquidity can be measured as a stock and flow perspective. From the stock perspective the management of liquidity needs evaluating the holdings of assets which might be converted into cash (Schwarz, 2017; Grullon, Kanatas & Weston, 2004). Within

this framework a comparison of holding of liquid assets with estimated liquidity needs is required to determine the liquidity adequacy. This concept of liquidity is criticized because it is too narrow in scope (Chen & Lu, 2017; Chang, 2017). From the flow perspective, liquidity measurement views the firm's economic capability to borrow and generate cash from its operations not just converting liquid assets into cash (Bolek & Wolski, 2012; Adebayo, David & Samuel, 2011). This approach indicates that, due to unrecognized future demand, liquidity standards determination will face difficulties. These two concepts are involving in applying financial ratios in measuring liquidity positions (Boudoukh & Whitelaw, 1993; Bolek & Wolski, 2012).

3. Methodology

Most of the investors and decision makers in the world are struggling with incapability of applying new concepts in evaluating and selecting available investment choices such as using analyzing financial ratios as a method to compare the available choices and then select the best choice among them, due to the lack of information in the financial statements of the companies. This might be due to unwillingness to establish all the important information in order to prevent their competitors to take advantage from them or to cover their weaknesses.

This research is important for the investors and shareholders to evaluate the companies' position regarding to liquidity by using financial ratios analysis in order to provide them information whether having a lot of liquid for a company sounds good or not. Being liquid means controlling obligations or means lack of investment? How the company can keep a balance between meeting its obligations and having ongoing investment in order to earn more return for the benefit of the investors, because most of them are asking and waiting for more profit. According to Bolek and Wolski (2012) investors consider profitability to be more important than liquidity. However, evaluating companies by its profitability will be bias, due to liquidity's importance to meet company's obligation to protect and prevent from bankruptcy. Although, financial ratios analysis can be used to evaluate the company' profitability as well, but this research focused mainly on the liquidity.

One of the UK based retailer company has been selected in this research which provide clothes, footwear, accessories and home products. This company distributes via three main channels. Therefore, the hypothesis will be:

$H_{1:}$ Analyzing liquidity ratio to evaluate the company's liquidity plays a significant role in choosing the best choices among available investment choices.

$H_{2:}$ Analyzing liquidity ratio to evaluate the company's liquidity will help creditors to decide to offer loans to the company.

4. Performance of the Company Liquidity

This company's liquidity performance can be analyzed by examining the following ratios:

4.1 Current Ratio with Relevant Ratios

This ratio is assessing the relationship between current assets and current liabilities. Company's current ratio is 1.3 in 2012. This means that for each £1 of current liabilities which has to be met by the business there is £1.3 in current assets (Gowthorpe, 2011). This figure decreased in 2013 into 0.9 which seems to be a problem for the company because current assets have not covered current liabilities precisely. This number has increased again into 1.5 in 2014 and started to decrease slightly into 1.4 and 1.3 in 2015 and 2016 respectively. In the case of coming all creditors together and requiring immediate payment which are about £758.1m and £832.9m in 2015 and 2016 there are actually just £107m and £49.3m respectively cash to pay them. However, this is unlikely to occur, it may give a month to pay and all the amounts do not have to pay in cash. Thus, it can be said that the company does not have any obvious liquidity problem.

Likewise, if we analyze the Inventory, Trade receivable and trade payable turnover to support this argument, we can see that the company can purchase its inventories by 43 days in 2012, 49 days for both 2013 and 2014, 47 days in 2015 and 55 days in 2016. Furthermore, it can receive its debtors by 64, 65, 71, 66 and 68 days in 2012, 2013, 2014, 2015 and 2016. Hence, it is paying its creditors by 96, 100, 75, 83 and 81 days in the duration of five years. This means that the company will purchase its inventory and receive its debtors and then it has more time to pay its creditors this could improve that the company does not have a clear liquidity problem.

years	2012	2013	2014	2015	2016
Current ratio	1.3	0.9	1.5	1.3	1.4

years	2012	2013	2014	2015	2016
Inventory turnover	43	49	49	47	55

years	2012	2013	2014	2015	2016
Receivables turnover	64	65	71	66	68

years	2012	2013	2014	2015	2016
Trade payables turnover	96	100	75	83	81

4.2 Quick Ratio with Relevant Ratios

This ratio works on the assumption which takes longer to turn inventories into cash. Thus, it leaves inventories out of analysis (Gowthorpe, 2011). The company's quick ratio is 0.9:1 in 2012, this means that for every £1 of current liabilities there is only 0.9 in cash or trade receivables available. In 2013 there is 0.6:1 of quick ratio which is really very low. So there might be a potential problem for meeting its liabilities. "It is difficult to generalize this point because, for a business which generates cash quickly such as food retailer can operate on a very low quick ratio" (Gowthorpe, 2011, p. 205), but for this company the situation is different as they are not food retailer. They cannot generate cash very quickly as it is clear in the appendix. If they sell any product they will receive the payments after 2 months in 2016.

On the other hand, their trade payables are longer than their receivables. This could help the company to achieve cash for their payments. When they received the payments after 2 months then they could provide its payables payments which are about approximately 2.5 months. In 2014 it has a ratio of 1:1:1, 1:1 in 2015 and 0.8:1 in 2016. It can be said that in 2014 and 2015 there is no problem in meeting its liabilities. However, for the other years there might be a big issue because in the case of all creditors come together to ask the payments, this company does not have enough assets to cover its liabilities. Also its cash is not sufficient as it mentioned before. Clearly, this scenario is unlikely to happen or they might give a month to achieve their payments.

years	2012	2013	2014	2015	2016
Quick ratio	0.9	0.6	1.1	1	0.8

4.3 Cash Interest Cover

From this table it is clear that this company did not generate cash from interest very much from their operating activities. Only in 2014 it had £25m times its interest but for the rest years they do not generate great cash from their interest. This may due to attracting their customers to purchase their products by loan with a low rate of interest or they might give an offer by reducing the interest rate for those who pay earlier than the actual date of payment.

years	2012	2013	2014	2015	2016
Cash interest cover	161.8	144.8	25	763	659.9

4.4 Quality of Earnings

The company has 1.2 of cash to profit ratio which means that their cash which was generated from their operating is higher than their profit which they achieved from their operations. This may influence on the capability of the company to pay their liabilities. This might due to selling their productions by cash because their main customers are common people not retailers so they pay by cash not by credit.

However, Disatnik, Duchin and Schmidt (2013) studied the interaction between corporate hedging and liquidity policies. They found that cash flow hedging decreases the firm's protective request for cash and allowed it to rely more on bank lines of credit. Moreover, they found a significant positive influence of cash flow hedging on a firm's value. On overall their findings identify a new mechanism by which hedging influences corporate financial policies and a firm's value. This means that if this company attempt to sell by credit their value of the company may be improved.

years	2012	2013	20014	2015	2016
Cash to profit ratio	1.2	1.2	1.2	1.3	1

Hakim, Triki and Omri (2008) studied the relationship between earnings quality and equity liquidity of Tunisian listed companies. They found that examination on the liquidity of an initial market such as the BVMT is very attractive because it is the most significant quality investors look for. Earnings quality seems to affect liquidity of stocks regarding to its influence on the information asymmetry. Based on a sample of 20 companies over a period from 2000 to 2005, they found that there is a statistically important relationship between their proxy of earnings quality and liquidity after controlling the stock exchange, size, returns of the equity and volatility. Their outcomes support that companies with higher earnings quality have lower bid-ask spreads and lower adverse selection spread components. This outcome supports theoretical models expecting that more quality of financial and accounting information is connected with a higher level of liquidity.

Saleem and Rehman (2011) examined a relationship between liquidity and profitability. The study purposed to disclose the relationship between liquidity and profitability so that each company has to keep this relationship while in showing day to day operations. The outcomes demonstrated that there is an important effect of only liquid ratio on ROA while unimportant on ROE and ROI. The outcomes also showed that ROE is not importantly affected by three ratios current ratio, quick ratio and liquid ratio while ROI is significantly affected by current ratios, quick ratios and liquid ratio. The main outcomes of the paper demonstrated that each ratio has a substantial influence on the financial positions. Profitability ratios also play a significant role in the financial positions of enterprises. Every stakeholder has concern in the liquidity position of a firm. Suppliers of goods are going to check the liquidity of the firm before selling goods on credit. Employees must also be worried about the company's liquidity to know whether the firm can meet its employee salary and pension. Therefore, a firm requires maintaining sufficient liquidity so that liquidity importantly influences profits of which some portion that will be divided to shareholders. Liquidity and profitability are closely related because while one of them increases the other one decreases.

Fernandez (2007) studied to find an answer about a question: "Do discounted cash flow valuation methods provide always the same value? And he used ten methods including free cash flow, equity cash flow, adjusted present value, risk adjusted free cash flow of business and equity cash flow, risk free rate adjusted free cash flow and equity cash flow, economic profit and economic value added. He found that

the methods always give the same value. Clearly, if this company used one of these methods they will receive the same value of evaluating its company's cash flow.

4.5 Alternative Current Ratio

By looking at the alternative current ratio for this company, it can be seen that the alternative current ratio for it is good. Cash was generated from its operations to meet its current liabilities for the years of (2012–2016) are £0.6m, £0.7m, £0.5m, £0.7m, £0.6m. Nevertheless, it is not enough to meet all the liabilities.

years	2012	2013	2014	2015	2016
Alternative current ratio	0.6	0.7	0.5	0.7	0.6

4.6 Cash Dividend Cover Ratio

Looking at return to owners for this company the cash dividend cover ratio are £4.8m in 2012, £4.7m in 2013, £4.2m in 2014, £5.3m in 2015, £3.5m in 2016. This means that the cash from this company which is generated from operation after paying interest and tax to satisfy its shareholders as a dividend is quite high. This may have influence on the share price of the company, because if the shareholders are satisfied they do not want to sell their share. Oppositely, other shareholders may interest in buying share from them and as a consequence share price will increase.

years	2012	2013	2014	2015	2016
Cash dividend cover	4.8	4.7	4.2	5.3	3.5

5. Company's Market Position

5.1 Dividend Cover Analysis

The company's dividend cover ratios are £3.2, £3.2, £2.8, £3.35, £3.09 for the duration of (2012 – 2016) respectively. This means that the director of this company could pay the current level of dividend 3.2 times out of available profits in 2012, similarly for the rest of the other ratios. Dividend cover ratio like any other ratios has limited use on its own. If dividend cover equals to 1 this means that all the profit which is available for the financial year is being paid over to shareholders in the form of dividends. This might be a matter of concern for the below reasons:

1- There might be no profit retained for the business.
2- It may be impossible to sustain this level of payment for future years (Gowthorpe, 2011).

It is clear for this company that they have a good profit during the last five years. They almost have about 3 times of dividend from their profit for the financial year. This absolutely makes an interest of investors to buy their shares because they seem to pay an appropriate dividend for their shareholders.

Thus, it can be said that the company has a good market position according to their dividend policy and their profit in the recent five years and avoiding the company from reception crisis because, sometimes some organization faced reception owing to having a decline in their share price because of their dividend payment which is not satisfied their shareholders. Therefore, the shareholders sold their share in a cheaper price because when the shareholders of any company decide to sell their share, this will affect the price and thus the price will begin to decrease and as a consequence the value of the company will start to decline. This might have an influence to the company to face reception crisis. Clearly, this company has an appropriate dividend payment to satisfy their shareholders because for the last 5 years it does not have losses and because they have approximately a stable ratio of dividend so it can be estimated that the company is far from reception crisis for the next five years due to having persuasive steady dividend.

years	2012	2013	2014	2015	2016
Dividend cover	3.2	3.2	2.8	3.35	3.09

5.2 EPS Analysis

Earnings per share can be defined as the amount of profit which is available theoretically per share (Gowthorpe, 2011). This company has EPS at a ratio of £2.9 in 2012 which is increased for the next 4 years. This does not mean that its shareholders have £2.9 in their pocket but it means theoretically the company has £2.9. The shareholders usually achieve less than this amount. Interestingly, in 2012 the shareholders have more than EPS in their dividend as it is mentioned before, this may because of achieving more profit than which was expected or there may have been a reception in 2012. In 2013 they have £3.4. This ratio decreased a little bit in 2014 into £3.1 and increased again for about £3.7 in 2015 and £4.3 in 2016.

years	2012	2013	2014	2015	2016
earnings per share (EPS) (£)	2.9	3.4	3.1	3.7	4.3

For investors if they have an option to buy a share from this company they may choose it because of their strong market position. They can be sure about their dividend, their share price and as an overall the value of the company which has an influence on the share price according to the both ratio analysis which is mentioned before.

6. Discussion

It can be stated that this company's liquidity regarding to current ratio, trade payables turnover, receivables turnover, and inventory turnover has not have a clear liquidity problem because, the company can purchase its inventory and receive its debtors and then it has more time to pay its creditors. Consequently, creditors can be attracted to decide to offer loans to the company, and this could improve the second hypothesis. Obviously, they cannot generate cash very quickly as it is clear in the appendix. If

they sell any product they will receive the payments after 2 months in 2016. On the other hand, their trade payables are longer than their receivables. This could help the company to achieve cash for their payments. Hence, lack of cash means investing well. This is quite different from the previous study which has been conducted by Bolek and Wolski (2012). They argued that companies in investors' point of view should be profitable and liquid on the level of cash to meet the opportunities on the market. Nonetheless, this scenario is not comfort with the large companies because they are already operating huge investments. Therefore, they do not have such amount of cash to meet all the opportunities on the market. Hence, having such amount of cash means lack of investment which is quite far from large companies and not necessary to have a lot of cash to obtain in to the market opportunities, because sometimes the companies can participate in the business by other assets not just cash.

7. Conclusion and Suggestions

It can be estimated that the company has not any liquidity problem through evaluating its current ratio but somehow it has some difficulties according to its quick ratio in years (2012, 2013 and 2016). Likewise, they do not have enough cash to pay their liabilities nonetheless having a small amount of cash means that the company is investing very well. This is a strong point for the company because it will attract investors to buy their shares and as a consequence their share price will increase and this will be influenced the value of the company. Furthermore, due to their strong market position the creditors may trust them and they do not want to come together to ask for their credit which finally may solve any problem that they had in their liquidity. Thus, for any investors it can be recommended that investing in this company or buying the company's share is not going to be bad due to their market position because, investors are more likely to concern about the company's market position even if the company has liquidity problem because market position can affect the share price powerfully.

A strong market position for this company can perform a significant role in increasing confidentiality for the company. The investors want to buy their share, the ordinary shareholders want to remain with the company and thus the creditors will give more time to them in order to pay their liabilities. However, having a strong market position is not sufficient for the company. They need to work through their liquidity problem which they faced in 2012, 2013 and 2016 according to their quick ratio. It is a fact that they do not have a big issue in their liquidity but they should not forget their confidentiality in the market to improve their value and attracting more investors in the future. However, having a lot of cash in the company might be manipulated by directors for their individual benefits. Therefore, cash has to be balanced in order to avoid the manipulations.

8. Limitations and Further Research Opportunities

While financial ratios analysis is a useful tool for evaluating company's liquidity, it has limitations which are needed to be mentioned. Comparison of one company with itself for duration of 5 years may not provide valuable clues about company's financial health and wealth. Due to changing in the method of valuing inventories from one year to another may result in misleading of comparison (Noreen, Brewer & Garrison, 2011). Ratios should be viewed as a starting point not an end, owing to raising a lot of questions for further analysis. However, they answer any questions by themselves rarely. In addition to ratios, other sources of data should be taken into consideration for the process of analysis and making judgments about company's future concern. For instance, business conditions, interpretation, and

changing within the company itself in their strategy should be evaluated by the analyst (Noreen, Brewer & Garrison, 2011).

Further research can be conducted in this area because, only evaluating company's liquidity by utilizing liquidity ratios analysis have been used in this research. For this reason, evaluating profitability, risk, corporate governance, and corporate social responsibility of companies can be completed regarding to the hypothesis of this research.

References

Acharya, V. V., Afonso, G., & Kovner, A. (2017). How do global banks scramble for liquidity? Evidence from the asset-backed commercial paper freeze of 2007. *Journal of Financial Intermediation*, 30, 1-34.

Allen, F., & Gale, D. M. (2017). How should bank liquidity be regulated?

Altman, E. I. (1968). Financial ratios, discriminant analysis and the prediction of corporate bankruptcy. *The Journal of Finance*, 23(4), 589-609.

Avramov, D., Chordia, T., & Goyal, A. (2006). Liquidity and autocorrelations in individual stock returns. *The Journal of Finance*, 61(5), 2365-2394.

Bolek, M., & Wolski, R. (2012). Profitability or liquidity: Influencing the market value-The case of Poland. *International Journal of Economics and Finance*, 4(9), 182.

Boudoukh, J., & Whitelaw, R. F. (1993). Liquidity as a choice variable: A lesson from the Japanese government bond market. *The Review of Financial Studies*, 6(2), 265-292.

Brunnermeier, M. K., & Pedersen, L. H. (2008). Market liquidity and funding liquidity. *The Review of Financial Studies*, 22(6), 2201-2238.

Castiglionesi, F., Feriozzi, F., & Lorenzoni, G. (2017). *Financial Integration and Liquidity Crises* (No. w23359). National Bureau of Economic Research.

Chang, B. (2017). Adverse selection and liquidity distortion. *The Review of Economic Studies*, 85(1), 275-306.

Chen, Z., & Lu, A. (2017). A market-based funding liquidity measure.

Chordia, T., Roll, R., & Subrahmanyam, A. (2008). Liquidity and market efficiency. *Journal of Financial Economics*, 87(2), 249-268.

Disatnik, D., Duchin, R., & Schmidt, B. (2013). Cash flow hedging and liquidity choices. *Review of Finance*, 18(2), 715-748.

Edmister, R. O. (1972). An empirical test of financial ratio analysis for small business failure prediction. *Journal of Financial and Quantitative Analysis*, 7(2), 1477-1493.

Fernandez, P. (2007). Valuing companies by cash flow discounting: ten methods and nine theories. *Managerial Finance*, 33(11), 853-876.

Fong, K. Y., Holden, C. W., & Trzcinka, C. A. (2017). What are the best liquidity proxies for global research? *Review of Finance*, 21, 1355-1401.

Gowthorpe, G. (2011). *Business Accounting and Finance*. 3rd ed. Knowledge Works Global Ltd India: Brendan, George.

Grossman, S. J., & Miller, M. H. (1988). Liquidity and market structure. *The Journal of Finance*, 43(3), 617-633.

Grullon, G., Kanatas, G., & Weston, J. P. (2004). Advertising, breadth of ownership, and liquidity. *The Review of Financial Studies*, 17(2), 439-461.

Guerrieri, V., & Lorenzoni, G. (2017). Credit crises, precautionary savings, and the liquidity trap. *The Quarterly Journal of Economics*, *132*(3), 1427-1467.

Hakim, F., Triki, F., & Omri, A. (2008). earnings quality and equity liquidity: Evidence from Tunisia. *International Journal of Managerial and Financial Accounting (IJMFA)*, 1(2), 147-165.

Huberman, G., & Halka, D. (2001). Systematic liquidity. *Journal of Financial Research*, 24(2), 161-178.

Hurst, E., & Lusardi, A. (2004). Liquidity constraints, household wealth, and entrepreneurship. *Journal of Political Economy*, 112(2), 319-347.

Lagos, R., Rocheteau, G., & Wright, R. (2017). Liquidity: A new monetarist perspective. *Journal of Economic Literature*, 55(2), 371-440.

Noreen, E. W., Brewer, P. C., & Garrison, R. H. (2011). *Managerial Accounting for Managers*. McGraw-Hill Irwin.

Olagunju, A. A., & Olabode, O.S. (2011). Liquidity management and commercial banks' profitability in Nigeria. *Research Journal of Finance and Accounting*, 2(7/8), 24-38.

Olagunju, A., David, A. O., & Samuel, O. O. (2012). Liquidity Management and Commercial Banks' Profitability in Nigeria. *Research Journal of Finance and Accounting*, *2*(7-8), 24-38.

Richardson, V. D., & Laughlin, E. J. (1980). A cash conversion cycle approach to liquidity analysis. F*inancial Management*, 32-38.

Saleem, Q., & Rehman, R. U. (2011). Impacts of liquidity ratios on profitability. *Interdisciplinary Journal of Research in Business*, *1*(7), 95-98.

Schwarz, K. (2017). Mind the gap: Disentangling credit and liquidity in risk spreads. Retrieved from https://repository.upenn.edu/fnce_papers/19.

Appendix

Ratio		2012 £m	2013 £m	2014 £m	2015 £m	2016 £m
current ratio =	current assets / current liabilities	1.3	0.9	1.5	1.3	1.4
Quick ratio =	current assets - inventory / current liabilities	0.9	0.6	1.1	1	0.8
Cash to profit =	cash generated from operation / profit from operation	1.2	1.2	1.2	1.3	1
Alternative current ratio =	cash generated from operation / current liabilities	0.6	0.7	0.5	0.7	0.6
Cash dividend cover =	cash generated from operation less interest & tax / dividend paid	4.8	4.7	4.2	5.3	3.5
Inventory turnover =	inventory * 365 / cost of sales	43	49	49	47	55
Receivable turnover =	trade receivable * 365 / revenue	64	65	71	66	68
Trade payable turnover =	trade payable * 365 / cost of sales	96	100	75	83	81
earnings per share(£) =	profit after tax attributable to equity shareholders / equity shares in issue	2.9	3.4	3.1	3.7	4.3
dividend cover =	profit after tax / interim + final dividend	3.2	3.2	2.8	3.35	3.09