

**REVIEWING THEORETICAL AND EMPIRICAL
LITERATURES ON CAPITAL STRUCTURE AND FIRM
PERFORMANCE RELATIONSHIP – AN EXPLORATORY
STUDY**

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Abstract

Keywords:

Modigliani-Miller Capital
Structure Irrelevance
Theory;
Capital Structure;
Financial Performance;
Theoretical and Empirical
Literature.

After the famous but controversial Modigliani-Miller Capital Structure Irrelevance theory many researchers tried to find and establish the relationship between capital structure and financial performance. Some researchers are in opinion that there is a negative relationship between the debt oriented capital structure and financial performance and some others suggest a positive relationship between the two. But still some other researchers are there, who have put forwarded supporting empirical results in favour of Modigliani-Miller theory. As both international and Indian scenario provides these controversial results as to the relationship between Capital Structure and Financial Performance, this gives an opportunity to the future researchers to study the existing theoretical and empirical literatures in this regard, so as to find a gap for further research on the topic. In this paper an attempt has been made in this regard. After analysing, it is found that there are many industries in India in which this empirical analysis can be performed either to confirm the theory or to add some further knowledge in this regard.

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1. Introduction:

Capital structure and its influence on the firm financial performance and overall value has been remained an issue of great attention amongst finance scholars since the decisive research of **Modigliani & Miller, (1958)** arguing that under perfect market setting capital structure doesn't influence the value of the firm. This proposition explains that *value of firm is measured by real assets and not the mode they are financed.*

(Hadlock and James (2002) argue that there is a positive relationship between capital structure and financial performance. **Fama and French (2002)** reported that there is a negative relationship. Capital structure is said to be closely link to the financial performance **(Zeitun and Tian, 2007)**. **Jensen and Meckling (2006)** posited that high leverage may initiate clashes between managers and shareholders due to selection of investment either equity, debt or hybrid **(Myers, 2004)**, the risk they want to take **(Jensen and Meckling, 2006, Williams, 2007)**, circumstances due to which firm might be liquidated **(Harris and Raviv, 2010)**, and the dividend policy. Verifiable predictions of such type of models is that the raise in leverage should decline agency costs of ownership and debt holders thus improving business performance, everything else remained the same as before. However, when the leverage is relatively high to a certain limit, leads to an increase in debt and it will increase cost of debt, including an increase cost of bankruptcy or financial distress due to conflicts between equity holders and bondholders. To make distinction between these two sources of agency costs empirically is very difficult. There exist a debate as to whether capital structure variables and financial performance or value of the firm are associated or not. There is two segments of believers: Modigliani and Miller and others who are in favour of non-association and Jensen and Meckling and others who are strong believers of association between capital structure and value of the firm.

2. Statement of Problem:

Capital Structure and Financial performance have long been studied to find their relationship since the proposition of Modigliani-Miller's Capital Structure Irrelevance theory. In Indian context, this relationship has also been studied. In this context reviewing the existing literatures - both theoretical and empirical, can help to find out new areas of further research in this topic. So an attempt has been made in this regard.

3. Theoretical Literature Review:

A firm funds its operation with capital raised from varied sources. A mix of these various sources is generally referred to as capital structure (CS). The CS has been defined as “that combination of debt and equity that attains the stated managerial goals (i.e.) the maximization of the firm’s market value”. The optimal CS is also defined as that “combination of debt and equity that minimizes the firm’s overall cost of capital”. The firm’s balance sheet constitutes different proposition of debt instruments, preferred and common stock, which represents the CS of the firm. The CS is an unsolved problem, which has attracted both academics and practitioners as the objective of financial management is to maximise shareholder’s wealth. The key issue here is the relationship between CS and firm’s value. The firm’s value is maximised when cost of capital is minimised. Therefore, they are inversely related. (**R. DEEPA 2011**).

A number of theories explain the relationship between cost of capital, CS and value of the firm:

- Net Income Approach (NIA)
- Net Operating Income Approach (NOIA)
- Traditional Approach (TA)
- Modigliani-Miller Approach (MMA)

The two extreme boundaries of valuation of the earnings of a firm are the net income approach and the net operating income approach. According to the net income approach, the firm is able to increase its total valuation and lower its cost of capital, as it increases the degree of leverage (LEV). The net operating income approach implies that the total valuation of the firm is unaffected by its CS as this approach is purely definitional, however, behavioural or economic meaning is attached to them. **Modigliani and Miller (1958)** offered behavioural support for the independence of the total valuation and the cost of capital of the firm from its CS. The traditional approach assumes that there is an optimal CS and that the firm can increase its total value through the judicious use of LEV. To find out what happens to the total valuation of the firm and to its cost of capital when the ratio of debt to equity, or degree of LEV is varied the assumptions such as: (i) no income tax, corporate or personal and no transaction cost, (ii) 100 per cent dividend pay-out ratio, (iii) operating income is not expected to grow or decline over time.

Given the above assumptions, the analysis focuses on the following rates:

$$r_D = \frac{I}{D} = \frac{\text{Annual interest charges}}{\text{Market value of debt}}$$

Assuming the debt is perpetual, r_D represents the cost of debt.

$$r_E = \frac{P}{E} = \frac{\text{Equity earnings}}{\text{Market value of equity}}$$

When the Dividend Pay-Out ratio is 100 percent and Earnings are constant, and here r_E represents the cost of equity.

$$r_A = \frac{O}{V} = \frac{\text{Operating income}}{\text{Market value of firm}}$$

Where, $V = D + E$, r_A is the overall capitalization rate of the firm. Since it is the weighted average cost of capital, it may be represented as follows:

$$r_A = r_D \left(\frac{D}{D+E} \right) + r_E \left(\frac{E}{D+E} \right)$$

The changes in r_D, r_E, r_A corresponding to changes in Financial Leverage (Debt/Equity) are discussed below.

3.1. Net Income Approach (NIA):

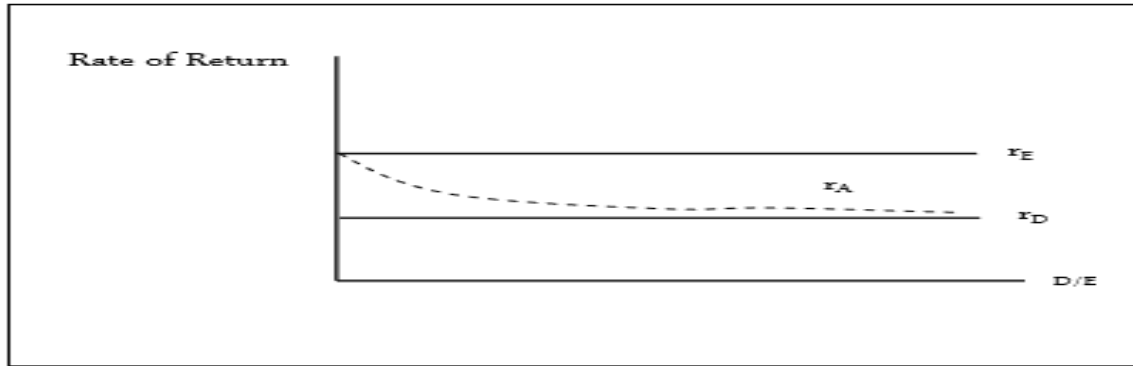
According to NI approach, the cost of debt, r_D , and the cost of equity, r_E , remain unchanged when D/E varies. The constancy of r_D and r_E with respect to D/E means that r_A , the average cost of capital, measured as follows:

$$r_A = r_D \left(\frac{D}{D+E} \right) + r_E \left(\frac{E}{D+E} \right)$$

As D/E ratio increases, r_A declines. This happens because when D/E increases, r_D , which is lower than r_E , receives a higher weight in the calculation of r_A .

The relationship of r_D, r_E, r_A as per NI Approach can be explained graphically as follows:

Figure (1): Relationship amongst r_D, r_E, r_A as per NI Approach



Source: R.DEEPA (2011)

From the above figure it is clear that as D/E ratio increases, being r_D, r_E constant, r_A reduces, as because proportion of Debt, being the cheaper source of finance increases in the Capital Structure.

3.2. Net Operating Income Approach (NOIA):

According to the net operating income approach (NOIA), the overall capitalisation rate and the cost of debt remain constant for all degrees of leverage. In the equation

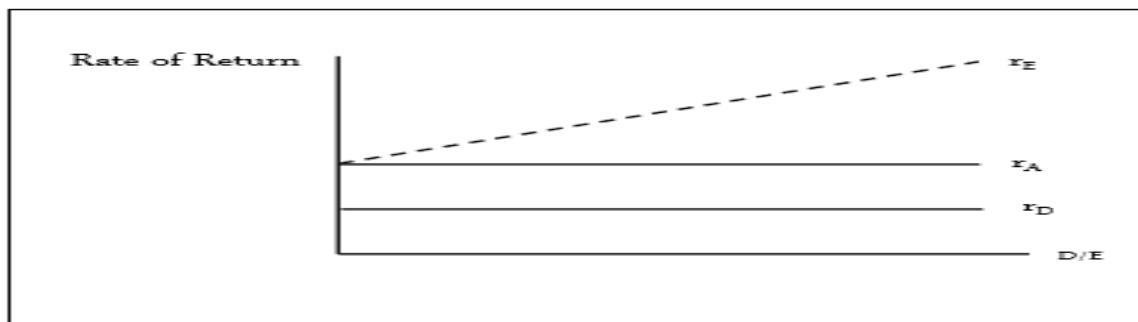
$$r_A = r_D \left(\frac{D}{D+E} \right) + r_E \left(\frac{E}{D+E} \right)$$

r_A and r_D are constant for all degrees of leverage. Given this, the cost of equity (r_E) can be expressed as follows:

$$r_E = r_A + (r_A - r_D) (D/E)$$

The above behaviour of r_D, r_E, r_A in response to D/E ratio can be explained graphically as follows:

Figure (II): Relationship amongst r_D, r_E, r_A as per NOI Approach



Source: R.DEEPA (2011)

The critical premise of this approach is that the market capitalises the firm as a whole at a discount rate which is independent of the firm's D/E ratio. As a consequence, the division between debt and equity is irrelevant. An increase in the use of debt funds which are 'apparently cheaper' is offset by an increase in the equity capitalization rate. This happens because equity investors seek higher compensation as they are exposed to greater risk arising from increase in the degree of leverage. They increase the equity capitalisation rate r_E (lower the price- earnings ratio, P/E), as the degree of leverage increases.

The net operating income position has been advocated eloquently by *David Durand*, who argued that the **market value of a firm depends** on its **net operating income** and **business risk**. The change in the degree of leverage employed by a firm cannot change these underlying factors. It merely changes the distribution of income and risk between debt and equity without affecting the total income and risk which influence the market value of the firm. (**R. DEEPA 2011**).

3.3. Traditional Approach (TA):

It is accepted by all that the judicious use of debt will increase the value of the firm and reduce the cost of capital. So, the optimum capital structure is the point at which the value of the firm is highest and the cost of capital is at its lowest point. Practically, this approach encompasses all the ground between the Net Income Approach and the Net Operating Income Approach, i.e., it may be called Intermediate Approach.

The traditional approach explains that up to a certain point, debt-equity mix will cause the market value of the firm to rise and the cost of capital to decline. But after attaining the optimum level, any additional debt will cause to decrease the market value and to increase the cost of capital.

In other words, after attaining the optimum level, any additional debt taken will offset the use of cheaper debt capital since the average cost of capital will increase along with a corresponding increase in the average cost of debt capital.

Thus, the basic proposition of this approach are:

- (a) The cost of debt capital (r_D) remains constant more or less up to a certain level and thereafter rises.
- (b) The cost of equity capital (r_E) remains constant more or less or rises gradually up to a certain level and thereafter increases rapidly.
- (c) The average cost of capital (r_A) decreases up to a certain level remains unchanged more or less and thereafter rises after attaining a certain level.

The principal implication of the traditional theory is that the cost of capital is dependent on the Capital Structure and there exist an optimal Capital Structure which minimises the cost of capital. **Staking and Babbel (1955)** findings in the Property-Liability insurance industry also supports this approach as their result show that the market value of equity at first grows but then later declines as leverage increases.

3.4. Modigliani-Miller Approach (MMA):

Modigliani-Miller' (MM 1958) advocated that the relationship between the cost of capital, capital structure and the valuation of the firm should be explained by NOI (Net Operating Income Approach) by making an attack on the Traditional Approach.

The Net Operating Income Approach, supplies proper justification for the irrelevance of the capital structure. In Income Approach, supplies proper justification for the irrelevance of the capital structure.

In this context, MM support the NOI approach on the principle that the cost of capital is not dependent on the degree of leverage irrespective of the debt-equity mix. In the words, according to their thesis, the total market value of the firm and the cost of capital are independent of the capital structure.

They advocated that the weighted average cost of capital does not make any change with a proportionate change in debt-equity mix in the total capital structure of the firm.

Based on the assumptions viz. Existence of Perfect Capital Market, Homogeneous Risk Class/Equivalent Risk Class, Homogeneous Expectation, the Dividend pay-out Ratio is 100%,

and Taxes do not exist, the following propositions outline the MM argument about the relationship between cost of capital, capital structure and the total value of the firm:

(i) The cost of capital and the total market value of the firm are independent of its capital structure. The cost of capital is equal to the capitalisation rate of equity stream of operating earnings for its class, and the market is determined by capitalising its expected return at an appropriate rate of discount for its risk class.

(ii) The second proposition includes that the expected yield on a share is equal to the appropriate capitalisation rate of a pure equity stream for that class, together with a premium for financial risk equal to the difference between the pure-equity capitalisation rate (r_E) and yield on debt (r_D). In short, increased r_E is offset exactly by the use of cheaper debt.

(iii) The cut-off point for investment is always the capitalisation rate which is completely independent and unaffected by the securities that are invested.

Since the irrelevance theorem by **Modigliani and Miller (1958)**, three main views of corporate capital structure have been advanced in which the method of financing matters:

- ✓ The Trade-Off Theory,
- ✓ The Pecking Order Theory and
- ✓ The Market-Timing Hypothesis.

3.5. The Trade-off theory of capital structure:

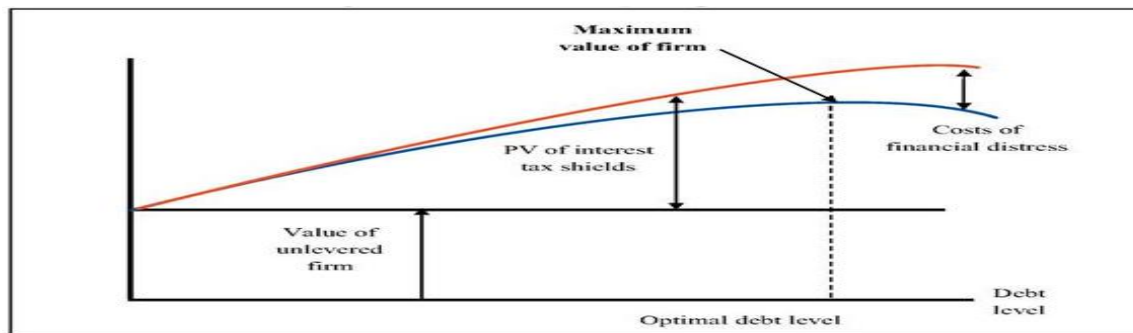
The trade-off theory states that the optimal capital structure is a trade-off between interest tax shields and cost of financial distress. An important purpose of the theory is to explain the fact that corporations usually are financed partly with debt and partly with equity. It states that there is an advantage to financing with debt, the tax benefits of debt and there is a cost of financing with debt, the costs of financial distress including bankruptcy costs of debt and non-bankruptcy costs (e.g. staff leaving, suppliers demanding disadvantageous payment terms, bondholder/stockholder infighting, etc.). The marginal benefit of further increases in debt declines as debt increases, while the marginal cost increases, so that a firm that is optimizing its overall value will focus on this trade-off when choosing how much debt and equity to use for financing.

Value of firm = Value if all-equity financed + PV(tax shield) - PV(cost of financial distress)

The trade-off theory can be summarized graphically. The starting point is the value of the all-equity financed firm illustrated by the black horizontal line in **Figure (III)** below. The present value of tax shields is then added to form the red line. The PV(tax shield) initially increases as the firm borrows more, until additional borrowing increases the probability of financial distress rapidly. In addition, the firm cannot be sure to benefit from the full tax shield if it borrows excessively as it takes positive earnings to save corporate taxes. Cost of financial distress is assumed to increase with the debt level.

The cost of financial distress is illustrated in the diagram as the difference between the red and blue curve. Thus, the blue curve shows firm value as a function of the debt level. Moreover, as the graph suggest an optimal debt policy exists which maximized firm value.

Figure (III): Graphical Presentation of Trade-Off theory of Capital structure



Source: *academlib.com*

In summary, the trade-off theory states that capital structure is based on a trade-off between tax savings and distress costs of debt. Firms with safe, tangible assets and plenty of taxable income to shield should have high target debt ratios. The theory is capable of explaining why capital structures differ between industries, whereas it cannot explain why profitable companies within the industry have lower debt ratios (trade-off theory predicts the opposite as profitable firms have a larger scope for tax shields and therefore subsequently should have higher debt levels).

There are two variants of Trade-Off theory, namely: **Static Trade-Off theory and Dynamic Trade-Off theory.**

In the first case the firm is viewed as setting a target debt to value ratio and gradually moving towards it. Whereas in Dynamic Model the same is done but implementing the role of time which is very significant in identifying the optimal capital structure. In the model, the firm's leverage responds less to short-run equity fluctuations and more to long-run value changes.

3.6. The Pecking Order Theory of Capital Structure:

Pecking order theory was first suggested by **Donaldson in 1961** and it was modified by **Stewart C. Myers and Nicolas Majluf in 1984**. It states that companies prioritize their sources of financing (from internal financing to equity) according to the cost of financing, preferring to raise equity as a financing means of last resort. Hence, internal funds are used first, and when that is depleted, debt is issued, and when it is not sensible to issue any more debt, equity is issued.

Pecking order theory starts with **asymmetric information** as managers know more about their company's prospects, risks and value than outside investors. Asymmetric information affects the choice between internal and external financing and between the issue of debt or equity. Therefore, there exists a pecking order for the financing of new projects.

Asymmetric information favours the issue of debt over equity as the issue of debt signals the board's confidence that an investment is profitable and that the current stock price is undervalued (were stock price over-valued, the issue of equity would be favoured). The issue of equity would signal a lack of confidence in the board and that they feel the share price is over-valued. An issue of equity would therefore lead to a drop in share price. This does not however apply to high-tech industries where the issue of equity is preferable due to the high cost of debt issue as assets are intangible.

The pecking order theory has emerged as alternative theory to the trade-off theory. Rather than introducing corporate taxes and financial distress into the MM framework, the key assumption of the pecking order theory is **asymmetric information**. Asymmetric information captures that

managers know more than investors and their actions therefore **provides a signal to investors** about the prospects of the firm.

The intuition behind the pecking order theory is derived from considering the following string of arguments:

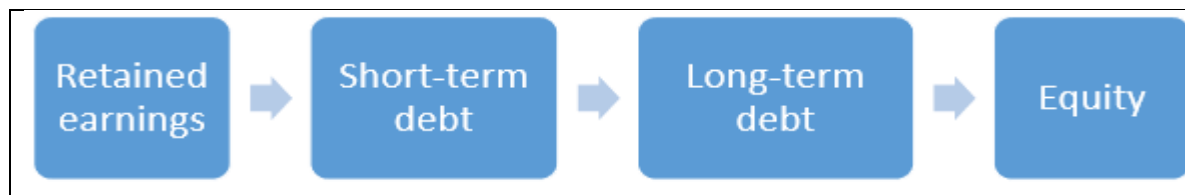
- If the firm announces a stock issue it will drive down the stock price because investors believe managers are more likely to issue when shares are overpriced.
- Therefore firms prefer to issue debt as this will allow the firm to raise funds without sending adverse signals to the stock market. Moreover, even debt issues might create information problems if the probability of default is significant, since a pessimistic manager will issue debt just before bad news get out.

This leads to the following *pecking order* in the financing decision:

1. Internal cash flow
2. Issue debt
3. Issue equity

The pecking order theory states that internal financing is preferred over external financing, and if external finance is required, firms should issue Short term debt first then long term debt and equity as a last resort as shown in the *Figure (IV)* below.

Figure (IV): Hierarchy of Financing under Pecking Order Theory



Source: Author Complied

Moreover, the pecking order seems to explain why profitable firms have low debt ratios: This happens not because they have low target debt ratios, but because they do not need to obtain external financing. Thus, unlike the trade-off theory the pecking order theory is capable of explaining differences in capital structures within industries.

3.7. The Market-Timing Theory of Capital Structure:

Baker and Wurgler (2002) have given a new theory of capital structure (CS): the “market timing theory of capital structure”. The theory states that the current CS is the cumulative outcome of the past attempts to time the equity market. In Corporate Finance ‘Equity Market Timing’ implies that firms issue new shares when they perceive they are overvalued and that firms repurchase their own shares when they consider these to be undervalued. The intension is nothing but to exploit the fluctuations in the cost of equity vis-à-vis cost of other sources of finance. As a result, current CS is strongly related to historical market values. The results suggest the theory that CS is the cumulative outcome of past attempts to time the equity market. Market timing has large, persistent effects on capital structure.

4. Empirical Literature Review:

Since the establishment of Modigliani-Miller hypothesis of capital structure, several empirical studies, around the world, have been conducted to measure the relationship between capital structure and company performance. In most of the studies, researchers revealed mixed results, some revealed positive relationship between variables, and others came up with negative relationships. Such contradicting results shows that the topic is still quite debatable, so it’s high time to measure the said relationship in Indian Automobile Industry.

4.1. Empirical Literature Review - International Scenario:

The first group of researchers who tested for the relationship between capital structure and company performance came up with negative results between the variables, which are as follows:

Mireku, Mensah, and Ogoe, (2014) studied with Ghana listed companies and their study revealed that firms financial performance have negative relationship with financial leverage and the firms depends more on the internal source of finance thereby supporting Pecking Order Theory of Myers and Majluf.

Tailab (2014) used 30 American energy firms as sample for a period of nine years ranging from 2005 to 2013 to test the impact of capital structure on Profitability of energy American firms and found negative association between debt ratio and ROE and ROA as proxy for profitability, while company size in terms of sales shown a negative effect only on ROE. The researcher used multiple regression method to analyse his data set, where 10% of ROE and 34% of ROA were predicted by independent variables of short term debt, long term debt, total debt to equity ratios and firm size as measured by company sales.

Nasreen, Khanam, and Pirzada, (2014) also tested the relationship between firm's capital structure and financial performance with 83 Pakistani Firms listed in Karachi Stock Exchange. Researchers used Debt-Equity ratio as proxy for Capital Structure and EPS, price earnings ratio, operating profit margin, ROA, ROE were used as a proxy for firm performance. After performing Regression analysis, the researchers found that financial performance was significantly affected by capital structure and the relationship was negative in nature. The study also showed a negative association between firm capital structure and market value.

Lavorskyi (2013) in Ukraine conducted a study on the impact of capital structure on firm performance using regression model and found negative impact with performance indicator as ROA, Total Factor Productivity (TFP), and EBIT margin. After analysing the relationship, the researcher concluded that leverage negatively affects firm performance.

Kaaya, Marobhe and Pastroy, (2013) in their paper "The relationship between capital structure and commercial bank performance" in Tanzania concluded through Pearson Correlation and Regression analysis that capital structure and bank performance was negatively associated. The result was statistically significant at 5% level.

Alawad (2013) in Saudi Arabia, used regression technique to measure the relationship between the variables of capital structure against variables of firm performance and found that all levels of debt ratios had inverse relationship with firm performance indicators of return on asset(ROA), return on equity(ROE) and profit margin.

Badu and Vitor (2012) studied 7 listed banks in Ghana from 2000 to 2010 and analysed the data using regression analysis. ROE and ROA was used as proxy for bank performance and different capital structure variables were used. The result showed a negative relationship between capital structure variables and bank performance.

Odita and Chinaemerem (2012) used regression and Pearson correlation to analyze the impact of capital structure on firm performance in Nigeria. He used performance measures of return on assets and return on equity while capital structure measures were debt ratios and controlling variables of asset turnover, firm size, age, asset tangibility and firm growth opportunity. His study results indicated a negative and significant relationship between performance measures of return on assets and return on equity against debt ratio.

Other study by **Zeitun and Tian (2007)** in Jordan used a sample of 167 Jordan companies from 1989 to 2003. His study results indicated a negative relationship between firm performance indicator of return on asset with capital structure indicators of total debt to total assets, long term debt to total assets, short term debt to total assets and total debt to total equity.

The second group of researchers tested for the relationship between capital structure and company performance found positive association between the study variables. Some of the studies are mentioned hereunder:

Soyebo, Idowu, and Onafalujo (2014) used ROA and ROE as proxies for firm performance and capital structure ratios such as Debt-Equity ratio and Debt to Asset ratio to analyse the relationship between the variables. Correlation Coefficient and Regression techniques were used to test a Panel Data of 10 companies for a period from 2000 to 2011. The study results indicated that the relationship between capital structure and ROA is not significant across all firms and insignificant relationship was shown between ROE and debt to asset ratio however the results showed the significant relationship between return on equity and debt to equity ratio for all firms. This justified that a highly geared firm tend to have high profitability.

Hughes, Baasi, and Addae, (2013) studied listed firms in Ghana and discovered statistically significant positive relationship between short term debt and profitability, whereas they found a

negative relationship between profitability and long term debt. The overall analysis of the study revealed that Ghana firms listed in Ghana stock exchange depended on short term debt than long term debt.

Priya (2013) who studied listed trading companies in Sri-Lanka and analysed the variables using correlation method and came up with the conclusion that Debt to assets ratio and Debt-Equity ratio of listed companies are highly correlated with Gross Profit Margin, Net Profit, ROCE, ROE at 5% level of significance. The final conclusion was that, there was a positive relationship between capital structure and financial performance of listed companies in Sri-Lanka.

Zuraidah, Abdullah, and Roslam, (2012) in their paper “Capital structure effect on firm performance” studied the relationship between the capital structure indicators of short term debt, long term debts and total debts against performance indicators of return on assets and return on equity. Researchers used Panel Data of 58 Malaysian firms from 2005 to 2010. The results of the study indicated that only Short term debt and total debt had a significant relationship with return on assets (ROA), and long term debt had a significant relationship with return on equity (ROE). Another study was done by **Abiodun (2012)** on the effect of optimal capital structure on manufacturing firms performance in Nigeria, used a sample of 10 firms from 2000 to 2009. Researcher used debt ratio as capital structure variable against company performance, and found that there is a relationship between the distribution of debt ratio and corporate performance and their main conclusion was that the manufacturing industries was consistent with trade off theory. That means debt ratio has positive relation with corporate performance.

Still there are other researchers who came up with a mixed results.

A study by **Leon (2013)** was about the impact of capital structure on financial performance of the listed manufacturing firms in Sri Lanka. He used a panel data of 30 listed manufacturing companies from 2008 up to 2012 to measure the relationship between dependent and independent variables. The data were analysed and hypotheses were tested using Correlation and Regression analysis using SPSS. The findings of his study revealed that, there is a significant negative relationship between leverage and return on equity at the same time the relationship

between leverage and return on asset showed no relationship. So his study showed somewhat a mixed result.

Toraman, Kilic, and Reis (2013) examined manufacturing companies in Turkey and discovered that there exist a negative relationship between short term debt to total assets, long term debt to total assets and Return on assets (ROA). They also discovered no significant relationship between total debt to equity ratio and ROA. Researcher used Panel regression model to measure the relationship between capital structure and company profitability and their sample size was 28.

Another Study by **Marietta (2012)** of listed companies in Kenya used multiple regression analytical models to measure the relationship between independent variables of institutional debt and institutional equity as proxy for capital structure variables against the dependent variables of ROA and ROE as proxy for firm performance variables and the study revealed that there is a negative relationship between total debt and firm performance. In terms of relationship between equity and firm performance, his study revealed that there is a significant positive correlation between return on equity (ROE) and total equity using Pearson Correlation.

Abbasali and Malekian (2012) in Tehran used Pearson correlation and Multiple Regression models to test the association between independent variables of Debt ratios against dependent variables of return on asset (ROA) and return on equity (ROE). Researchers also used variables such as asset turnover, firm size, and asset tangibility and growth opportunity controlling variable. The results of the study showed a mixed outcome, such as a negative relationship between debt ratio and financial performance and a significant positive relationship between asset turnover, firm size, and asset tangibility and growth opportunity with financial performance measure.

Mihaela (2012) studied listed firms in Romania, his results indicates that there was a contradictory outcome. As he delivered both in favour of the positive correlation and in favour of negative correlation between the capital structure and firm's performance. Due to this

conclusion, it was not clear whether capital structure influenced performance or not, for that case he finally concluded that further study on this relationship has to be conducted.

4.2. Empirical Literature Review - Indian Scenario:

Empirical research as to Capital Structure and Firm Performance and their relationship has long history in India too. Post Modigliani-Miller study, many researchers have tried to find out whether Capital Structure irrelevant theory hold good in Indian context or not, and whether Capital Structure affect firm performance and shareholders value.

Ramachandran and Madhumathy (2016) in their paper “A Study on Capital Structure and Financial Performance of Indian textile industry” studied ten textile companies from financial years 2004-2005 to 2013-2014. They used Percentage analysis and multiple correlation tests to analyse the collected data. They used Debt Equity ratio as proxy for capital structure and Net Profit Margin, ROCE, Return on Net worth, ROA and EPS as proxy for Financial Performance. Correlation analysis result showed that Debt Equity ratio is negatively associated with all the Performance measures, but only Net Profit Margin and Return on Net worth was statistically significant at 5% level.

Takeh and Navaprabha (2015) in “Capital Structure and its Impact on Financial Performance of Indian Steel industry” studied 13 Indian steel companies for a period from 2007 to 2012. They used Operating Profit Margin (OPM), ROA, ROE and ROCE as an indicator of financial performance (dependent variables) and Total Debt Equity Ratio (TDER), Total Asset Debt Ratio (TADR), Interest Coverage Ratio (ICR) and Financial Debt Ratio (FDR) as independent variables. They analysed the data using Descriptive statistics, Correlation Matrix and Multiple regression models. But out of 16 pairwise correlation only two pairs were statistically significant. ROCE has a positive and strong relationship with ICR and Correlation was significant at the 0.01 level. Another significant correlation (Negative) between ROE and TADR. The result of multiple regression and ANOVA indicated that there is a significant impact of capital structure on OPM, ROCE, and ROE. There is a no significant impact of capital structure on ROA. Finally they concluded by confirming that there is negative relationship between capital structure and financial performance of Indian steel Industry.

Goyal (2013) with his study on listed public sector banks in India, tested the study variables using regression analysis. The results of his study validated a strong positive dependence of short term debt to capital with all profitability measures of ROA, ROE and EPS while long term debt to capital and total debt to capital had a negative relationship with return on assets (ROA), return on equity (ROE) and Earning per share (EPS).

Azhagaiah and Deepa (2011) in a study titled “Impact of firm size on the relationship between profitability and capital structure” analysed the impact of sales size on the relationship between Profitability and leverage, considering the size as the control variable. Their findings proved that there exists a positive correlation between Profitability and leverage in case of small size firms while, it showed a negative relation between Profitability and leverage in case of large firms providing evidence that debt capital decreases with increase in SIZ of the firm.

Bhattacharjee (2010) in a paper entitled “Determinants of capital structure of Indian industries” conducted an empirical study of the determinants of Capital Structure of 151 selected firms across 13 industrial sectors. His major finding was that the variables like liquidity and Growth in terms of performance of the firms have significant influence on debt-equity ratio. In other words, sustainable growth along with credit worthiness of the firm influences debt-equity ratio i.e., degree of financial leverage. The study concluded that leverage varied across industries and between firms belonging to the same industrial sector.

Dogra and Gupta (2009) in a research paper entitled “An empirical study on capital structure of SMEs in Punjab” analyzed various factors affecting Capital Structure and their impact on the decision-making ability of the SMEs. A sample of 50 manufacturing units was taken for the purpose of analysis. They found out that optimum capital structure enhances the Profitability and subsequently the value of the firm; SMEs relied more on their own funds and comparatively less on borrowed funds. They ranked flexibility, management control, liquidity and cost of capital with ranks from 1-4 respectively as the prime determinants of capital structure.

5. Conclusion:

Capital structure has a crucial role in determining company's financial performance and fulfils the expectations of shareholders who always demand for the value maximization. "capital structure decision is critical for any firm for maximizing return to the various stakeholders and also enhance firm's ability to operate in a competitive environment", **Goyal (2013)**.

Even though firms have a choice on how to combine debt and equity, managers attempt to ascertain a particular combination that maximizes firm's Market value, **Badu and Vitor (2012)**. **Ross (2002)** reinforced the importance of capital structure decision to finance managers by stating that the finance managers try to find that optimum capital structure that maximizes the value of the firm. His argument shows that capital structure decision is one of the crucial decisions that help to maximize company value in and subsequently the value of the shareholders.

The idea of relating company's capital structure and its value started since the establishment of irrelevancy theory of capital structure by **Modigliani and Miller (1958)**. This theory was cited by **Toraman (2013)** as, "firm value is independent of its capital structure". In recent years, researchers come up with different perspectives of their studies: some revealed the positive relationship between capital structure and company performance (**Safiuddin (2015)**, **Adesina (2015)** and **Sarkar (2016)** in their study found that capital structure has a strong positive associated with firm's performance), whereas others revealed the negative relationship between the variables, namely, **Narayanasary (2015)** and **Mwangi (2013)** concluded a negative relationship between capital structure and company performance.

Because of the controversial results revealed by previous researchers, this situation provides an opportunity to the future researcher to add the knowledge by analysing the effect of capital structure on Company Performance of a particular industry, say, Indian automobile Companies, or broadly Indian Manufacturing sector.

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