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# Impact of Working Capital on Profitability and Market Capitalization of the Indian Companies: A Study and Sectorial Analysis

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### ABSTRACT

Working Capital Management is the key area for sectors and companies in the economy. In the past there had been various researches elaborating about the impact of Working Capital on an organization. Looking into these criteria's it is important to understand the relationship between working capital, profitability and the market capitalization of a firm. Convenience sampling method is applied to collect the secondary data collected from annual reports of the companies which are further used for data analysis to find out the relation of 3 important parameters. In this research, we would establish the relation of working capital with various other factors statistically.

Keywords: profitability, capitalization, sectorial analysis, capital management etc.

### **INTRODUCTION:**

"A budget tells us what we can't afford, but it doesn't keep us from buying it"

Working capital management has become vital within the money management of the firm. There are many different vital factors why the assets management is taking significantly in little and huge corporations (Smith, 1980). It is an issue while creating a financial decision since it's being a part of an investment in an asset that needs acceptable funding investment. However, assets are usually being disregard in money higher cognitive process since it involves investment and funding in the short amount. Furthermore, it conjointly acts as a restraint in money performance, since doesn't contribute to return on equity (Stanger, 2001).

A well-designed policy of asset management is predicted to contribute completely to the firm's worth (Padachi, 2010). Current assets of the many firms are 0.5 than the full assets and are even higher within the distribution sector (Horne and Wachowicz, 2009).

Efficiency in asset management is so important for particularly production corporations whose current assets are the main part of the assets (Horne and Wachowicz, 1998 and Raheman and Nasr, 2007). Bankruptcy is additionally to be possible of that corporation that has an accurate assets policy even if their performance is consistently positive (Kargar and Bluemental, 1994).

The problem here is that the management of assets, how corporations should balance its risk and return. Factors that influence working capital includes money, assets, short funding choices, the character of the business, market and demand conditions, technology and producing, operative potency, index number changes.

Components includes:

a) Current assets	b) Current Liabilities				
- Creditors	- Cash				
- Accrued expenses	- Marketable Securities				
- Notes payables	- Debtors				
- Current portion – long term debt	- Inventory				

## Types of working capital:

a)On the basis of value	b) On the basis of time	
- Gross WC	- Permanent	
- Net WC	- Temporary	

Operating cycle is one in all the foremost reliable strategies of computation of working capital. However, different strategies like magnitude relation of sales and magnitude relation of fixed investment may be accustomed confirm the working capital necessities. These methods explained below:

- 1) Current assets holding period
- 2) Ratio of sales
- 3) Ratio of fixed investments

### **Industries:**

- Steel
- Cement
- Aviation
- IT
- FMCG

## **REVIEW OF LITERATURE:**

*Greg Filbeck and Thomas M. Krueger (2005)* in their paper talks that how firms pull together with one other against time with relation to the working capital. However working capital measures don't seem to be static. Findings of the paper are insight on working capital performance across time and on asset management countries. Changes in interest rates, rate of innovation, and competition are seemingly to impact on working capital management.

*Kesseven Padachi (2006)* in their paper talks that the printing business has been ready to succeed high scores on the varied parts of working capital that result into positive gain. Paper mentioned this business as "hidden champions" and could say that as best practices among the SMEs.

*Azhagaiah Ramachandran and Muralidharan Janakiraman (2009)* in their paper talks regarding the connection between working capital potency and EBIT of the paper trade on the idea of 3 index values Performance Index (PI), Utilization Index (UI), and Efficiency Index (EI). Adequate working capital has direct impact on EBIT and profit of the corporate.

*David M. Mathuva (2010)* in their paper talks that how a corporation will increase the worth of stakeholders by reducing the no. of accounts receivable, increasing their inventories at an affordable level. Companies may also take longer to pay their creditors as so much as they are doing not strain relationships with these creditors. Companies are capable to realize a sustainable competitive advantage by effective and economical utilization of resources through a careful reduction in the CCC at its minimum which ends up in a rise in the gain.

*Hernan Etiennot et al. (2012)* in their paper uses a framework that mixes two ideas i.e. FNO and Working Capital, permitting them to take the primary steps towards an integrated and perceptive treatment of working capital practices. FNO represents the operational investment that must be actively supported by the firm. FNOs are stricken by activity level; but (1) Company (2) Industry (3) the region within which the firm operates.

Sumathi A and Narasimhaiah T (2016) in their paper, the position of the Infosys is satisfactory. Earlier company wasn't in a smart position, however currently it's a growing trend, a serious portion of the assets is in the style of a firm's stock or inventories. The firm's liquidity or economic position majorly depend on inventory size however alternative factors like debtors, advances, and loans, cash, and bank balances, bills rec. etc. are also accountable. The management of the Infosys ought to keep a watch on inventory size and take a look at to carry the desired inventory so liquidity won't interrupt.

# **OBJECTIVE:**

Objective of this research, is to find the relationship of working capital with profitability and market capitalization of the company.

Null hypothesis in this paper is there is no relationship of working capital with profitability and market capitalization.

## **RESEARCH METHODOLOGY:**

The study uses secondary data collected from Aceanalyser.com and company's annual report. The collected data from this source has been compiled and used with due care as per the requirements of the study.

The sample of 23 companies from 5 different sectors (i.e. 3 manufacturing and 2 non-manufacturing) has been taken for this study. The data has been analysed with the use of statistical tool (Correlation and regression). The data used for the analysis relate to the selected companies for the period of 5 years on a yearly basis ranging from 2013-17.

## DATA ANALYSIS AND INTERPRETATION:

In order to measure the relationship; coefficient of determination and coefficient of correlation model has been used. In this model "p value" has the main importance which represents if p value is less than 0.05 then null hypothesis will be rejected and alternate hypothesis will be accepted. Coefficient of correlation shows whether there is relationship between 2 variables. And Coefficient of Determination represents that how strongly one variable affect other variable. For these two, standard term "0.7" has been taken. Comparison has been done on the basis "0.7".

Industry	Company	Profitability		
		Coefficient of determination	Coefficient of correlation	p value
Aviation	Indigo	0.812977973	0.901652911	0.036472
	Jet airways	0.333133758	0.577177406	0.308248
	Spice jet	0.006428812	0.080179874	0.898021
Steel	JSW	0.226357498	0.475770426	0.41793
	Tata	0.76300715	0.873502805	0.126497
	JSPL	0.306572428	0.55368983	0.332912
	SAIL	0.74823821	0.865007636	0.058318
	Bhushan	0.885522391	0.941021993	0.017041
IT	HCL	0.362960516	0.602462046	0.282252
	Hexaware	0.525520436	0.724927883	0.165851
	Mindtree	0.825844334	0.908759778	0.032627
	Tataelxsi	0.888442824	0.94257245	0.016377
	Techmahindra	0.909478838	0.953665999	0.011889
FMCG	ITC	0.180887137	0.425308285	0.574692
	HUL	0.073349936	-0.270831934	0.729168
	Godrej	0.39617184	-0.62942183	0.255212
	Dabur	0.918306482	-0.958283091	0.041717
	Nestle	0.368215607	0.606807718	0.277845
Cement	ACC	0.002417297	-0.049166012	0.937425
	Ultratech	0.14205857	0.376906581	0.531725
	JK	0.067802248	-0.260388649	0.672248
	Heidelberg	0.360117651	-0.600098034	0.284657
	Ramco	0.53444523	-0.731057611	0.1605

Table 1

The above data inferred the effect of working capital on Profitability of the company. The highlighted p value in the column "p value" of the table-1 shows that the null hypothesis has been rejected and alternate has been accepted. There are only 6 companies out of 23 which have relationship between their working capital and profitability. In IT industry working capital has the highest impact on profitability (Same is reflected from statistical results). In the coefficient of correlation 10 companies show that there is higher relationship between these 2 and yellow highlighted cells denote there is a negative relationship that means if working capital goes lower, profit of the company goes higher. But we consider only those coefficient of correlation who have p value of less than .05. In the column of coefficient of determination highlighted companies show that how strongly working capital is affecting profitability of the company. From all the 5 industries only IT industry accepts the alternate hypothesis i.e. there is a relationship between working capital and profitability.

Industry	Company	Market Capitalization		
		<b>Coefficient of determination</b>	<b>Coefficient of correlation</b>	p value
Aviation	Indigo	0.735053401	0.857352553	0.063272
	Jet airways	0.037545885	0.193767606	0.75484
	Spice jet	0.059272903	-0.243460269	0.693107
Steel	JSW	0.561407292	-0.749271174	0.144908
	Tata	0.096298119	-0.310319383	0.689681
	JSPL	0.318962612	0.56476775	0.321219
	SAIL	0.22833803	0.477847287	0.415606
	Bhushan	0.520587118	0.721517233	0.16885
	HCL	0.831108268	0.911651396	0.031102
IT	Hexaware	0.847898779	0.920814193	0.026429
	Mindtree	0.88615181	0.941356367	0.016897
	Tataelxsi	0.620296458	0.787589016	0.113698
	Techmahindra	0.433734047	0.658584882	0.226809
FMCG	ITC	0.009126609	-0.095533289	0.904467
	HUL	0.025838349	0.160743116	0.839257
	Godrej	0.289480729	-0.538034134	0.349614
	Dabur	0.787374034	-0.887340991	0.112659
	Nestle	0.313745398	0.560129805	0.326102
Cement	ACC	0.242087481	0.492023863	0.39982
	Ultratech	0.000732594	-0.02706648	0.965542
	JK	0.630737584	-0.794189892	0.108555
	Heidelberg	0.502364252	-0.708776588	0.180189
	Ramco	0.524395131	-0.724151318	0.166533

Table 2

In this data, relationship between working and market capitalization has been shown. There are only 3 companies out of 23 which have relationship between their working capital and market capitalization. And these 3 companies are from IT industry, so in nutshell only IT companies have the impact of working capital on market capitalization.

### **CONCLUSION:**

This research conclude that relationship of all three terms differ from sector to sector and company to company. Some companies show negative relationship, some show neutral. But in IT companies it shows the strong relationship between Working capital and profitability, Working capital and Market Capitalization. For further study on the same topic we can consider more number of Sectors and companies.

# **REFERENCES:**

- Azhagaiah Ramachandran and Muralidharan Janakiraman, (2009). The Relationship between Working Capital Management Efficiency and EBIT, *Managing Global Transitions*, Vol. 7 No. 1, pp.61-74
- David M. Mathuva, (2010). The influence of Working Capital Management Components on Corporate Profitability: A Survey on Kenyan Listed Firms, *Research Journal of Business Management*, Vol. 4, pp.1-11
- Etiennot, Hernan; Preve, Lorenzo A.; Allende, Virginia Sarria, (2012). Working Capital Management: An Exploratory Study, *Journal of Applied Finance*, Vol. 22 Issue: 1, pp.162
- Greg Filbeck and Thomas M. Krueger, (2005). An Analysis of working capital management results across industries, *American Journal of Business*, Vol. 20 Issue: 2, pp.11-20.
- J.K. Sharma, (2008). Business Statistics, Dorling Kindersley (India) Pvt. Ltd.
- Kesseven Padachi, (2006). Trends in Working Capital Management and its impact on firms' performance: An Analysis of Mauritian Small Manufacturing Firms, *International Review of Business Research Papers*, Vol.2 No. 2, pp.45-58
- Sumathi A and Narasimhaiah T, (2016). A Study on the Effect of Working Capital on the Profitability of Infosys, *ICTACT Journal on Management Studies*, Vol. 2 Issue: 3

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