

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

Economic Value Added of Nifty 50 Value 20 Index Companies

Prof. Sunil Kumar Gupta¹ & Ravinder Kumar Bhatia²

¹Department of Commerce, D. A. V. College, Kanpur. Uttar Pradesh, India

²Research Scholar, C. S. J. M. University, Kanpur

Received: 01 April 2025 Accepted & Reviewed: 05 April 2025, Published : 30 April 2025

Abstract

Company valuation methods have been broadly classified into absolute valuation methods and relative valuation methods. Absolute valuation methods include - Discounted Cash Flow Method, Dividend Discount Model, Residual Income Model, Payback Period, Modigliani Miller Model and Economic Value Added Method. Absolute valuation methods are company specific and take growth rate of company, discount rate, terminal value, dividends etc to project the growth of the company. Relative valuation methods compare the variables of the company with the similar company and find out the best company for investment by the investment managers. Relative valuation includes PE ratio, PEG ratio, Dividend Payout Ratio, EPS, Growth Rate, Price to cash flows, EV to EBITDA, ROCE and ROE etc to compare the companies. Various valuation methods have been used by the authors and investment managers to find out the value of the company. As per Warren Buffet, value of company is the present value of future discounted cash flows to the company. Aswath Damodaran and Pablo Farnandez, prominent authors of valuation, has similar consensus with the Warren Buffet, but at the same time they found that 90 to 95 percent valuations are relative valuations. Relative valuations are easy to use and less time consuming. Stern Stewart & Company and various other authors found that EVA is the best method for the valuation of the companies. The claim of Stern Stewart & Company has been rejected by the authors and they found that accounting variable based valuation methods have greater predictive power than EVA. In this research paper, author is using Economic Value Added method of valuation and tests its relation with the market value of the company. Nifty 50 value 20 Index has been taken as a sample to find the relation of EVA with the market value of the company.

Key Words: Valuation, EVA, Nifty 50 Value 20 Index, NOPAT, WACC, Invested Capital.

Introduction

Nifty 50 Value 20 index constitute 20 large cap well diversified portfolio of value companies from Nifty 50 Index. The maximum weight given to each stock is 15 percent. The launch date of the Index is 28th March 2014. The base value of the Index is taken at 1000 from 1st January 2009. From the base date Index multiplied 12 times in 16 years. Criteria for selection of stocks are lower PE and P/B Value ratio and higher D/Y and ROCE ratio.

There are number of valuation methods used by the Investment Managers to determine the intrinsic value of share and margin of safety in buying decisions. Some expert uses Relative valuation methods to value the company and its stock price by comparing it with similar companies whereas other uses absolute valuation models to find the companies intrinsic value. An expert or fund manager can use both absolute valuation models and relative valuation model to find the intrinsic value of a share. Each method of valuation has its own set of advantages and limitations. The role of Investment Manager is to forecast future earnings, future

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

cash flow & future growth rate on the basis of past results, industry trends and systematic and unsystematic risk related to the company. Stern Stewart and company propounded Economic Value Added method of company valuation in 1990 and analyzed that it is the best method of company valuation. Economic Value Added can be calculated by subtracting the finance charge from the Net Operating Profits after Taxes. EVA determines the economic profits left with the company after deducting the charges of cost of capital of the company. Several authors found from their data sample and analysis Economic Value Added is the best method to define Market Value Added whereas several other authors reject the claim made by Stern Stewart and company and find that accounting variables such as earnings, net profit, operating profits has greater explanatory power to define Market Value Added than EVA. But authors around the world unanimously agree on the theory that company will add value only when its return on invested capital is greater than its cost of capital. If return on invested capital is less than cost of capital company will destroy value.

Economic value added also known as economic profits of the company. It measures the return generated over and above investors required rate of return. Economic value added is calculated by deducting the Finance Charge from Net Operating Profits after taxes. When EVA is positive company is adding value and EVA is negative it means that company is destroying value. Net operating profits after taxes are calculated by deducting taxes from EBIT. Finance charge is calculated by multiplying required rate of return to the invested capital. Invested capital is the difference of total assets minus current liabilities. It can also be calculated by adding shareholders equity and debt capital of the company. (Vipond, Economic Value Added (EVA))

EVA = Net Operating Profits after Taxes - Finance Charge

Or

EVA = Net Operating Profits after Taxes – (Invested Capital x WACC)

Invested Capital = Total Assets - Current Liabilities

Or

Invested Capital = Shareholders Equity Capital + Debt Capital

Net Operating Profits after taxes = EBIT (1 - Tax Rate)

EBIT = Earnings before Interest and Tax.

Objectives of the Study

1. To calculate the Economic Value Added of Nifty 50 Value 20 Index Companies.
2. To compare the companies of Nifty 50 Value 20 Index on the basis of EVA.
3. To analyze the effect of Economic Value Added on the market price of the company.

Hypothesis

Ho: There is no significant relationship between Economic Value Added and Market Price of the Company.

H1: There is significant relationship between Economic Value Added and Market Price of the Company.

Review of Literature

Parul Girdharilal Ahuja & Sagar Dave (2020) analyze EVA and MVA method of company valuation and also measure the relationship of EVA and MVA of five companies from the auto sector. The results of their study conclude that there is no significant relationship between EVA and MVA.

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

Habibollah Nakhaei & Nik Intan Norhan Abdul Hamid (2013) observed the relationship of Operating Profit, Net Profit and Economic Value Added with Market Value on 87 non-financial companies in Tehran Stock Exchange over the period 2004 to 2008. They found that EVA has direct and significant relationship with share market value, but the relationship of Net Profit and Operating Profit is more than the relationship of EVA with Market Value. The correlation coefficient between N.P., O.P. and E.V.A. with M.V. is 78%, 77% and 65% respectively.

Anil Kumar Sharma & Satish Kumar (2010) review 112 papers on Economic Value Added and related aspects of EVA from 1994 to 2008 and conclude that there are mixed evidences about the superiority of EVA over traditional performance measurement tools. Some authors and researches are in favor of EVA whereas other researchers found that traditional accounting measures are superior to EVA.

Archana Singh (2008) examines the relationship of EVA and MVA of 75 sample companies listed in Indian Stock Exchange during the period 1998 to 2007 and found that some companies have positive MVA but negative EVA and also some companies have negative MVA and positive EVA. When multiple linear regression models applied to all sample companies to find out relationship of variables, researcher found that P/B Ratio and Cash Profit variables are more significantly associated than EVA in explaining the variation of MVA of Indian companies.

Biddle et al. (1998) studied four variables namely economic value added, residual income, earnings and cash from operation to test the claim of Stern Stewart's & Company that EVA is more closely associated with the market returns in comparison to earnings. Authors studied 6,174 observations of 773 companies for the period under study from 1984 to 1993. Tests result of their study indicate that earnings ($R^2 = 12.8\%$) is significantly more highly associated with market adjusted annual return than residual income ($R^2 = 7.3\%$) and economic value added ($R^2 = 6.5\%$). All the above three variable dominate cash from operation ($R^2 = 2.8\%$). While testing the component of EVA, author find that cash from operation and operating accruals are significant but capital charge and accounting accruals are not significant. Test result concludes that neither EVA nor RI dominates earnings.

Fernandez, P. (2019) analyze 10 year data (1987 to 1997) of 582 sample companies to test the effectiveness of EVA and cash value added on shareholder value creation. Out of the total 582 companies, 296 companies correlation between increase in market value added each year and the NOPAT was greater than EVA. Out of total 582 companies, 210 companies showing negative correlation with EVA. The average correlation between increase in MVA and EVA, NOPAT and WACC was 16% 21 and - 21.4% respectively. As per the test results, there was only 18 companies whose correlation with EVA is between 80 to 100%.

Nufazil Altaf (2016) studied relationship of market value added with EVA and earnings. Market value added is taken as depended variable and EVA, operating income, operating profits, PAT, Cash Flows, EPS, ROI, ROCE and RONW are taken as Independent variables. 325 Indian companies from manufacturing sector (170) and service sector (155) taken as sample and time period of the study (10 years) was 2005-06 to 2014-15. Test result found that operating income is strongly related to define market value added than EVA. Cash flow and EPS are showing insignificant association with market value added. Univariate and multivariate regression analysis was used for the analysis of the research paper.

In this research paper, author will calculate economic value added of Nifty 50 value 20 index companies in 2024-2025 and test its correlation with the change in market value.

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

Research Methodology

NOPAT has been calculated by taking trailing 12 months profits on 31st March 2025. Change in market value of the company has been calculated by deducting the market value of the companies on 31st March 2024 from the market value of the companies on 31st March 2025. To test the relationship of EVA with the market value of the company correlation has been calculated. EVA has been taken as independent variable and change in market value has been taken as dependent variable. For calculating weighted average cost of capital after tax cost of debt has been calculated from the financial statements of the companies and cost of equity is calculated by using CAPM model. Risk free return has been calculated by using the rate (8.05) of RBI seven year floating rate bond. Return from market portfolio has been taken at nifty long term returns (12 percent) in last 20 years.

Analysis & Interpretation

Correlation result reported that Economic Value Added by some of the companies of the Nifty Value 20 Index has been offset by the banking companies due to negative EVA. The mean EVA is negative and hence it shows that there is no value added by the Nifty Value 20 Index companies in the year 2024 -2025. This is due to volatility in the short run and long uptrend cycle after Covid 19. The mean market value addition is 8599 Crore. This indicates us on an average market value addition of Nifty Value 20 Index companies is on the positive side. The Correlation between economic value added and change in market capitalization is – 0.159, indicate us a low & negative correlation between the variables. This shows that changes in the Economic Value Added are low and negatively correlated with the changes in market value. Thus our null hypothesis is accepted and we can say that there is no significant relationship between economic value added and market price of the company.

Descriptive Statistics

	Mean	Std. Deviation	N
Economic Value Added	-10103.2500	74872.18118	20
Change in Market Capitalization	8599.1500	60435.37366	20

Correlations

		Economic Value Added	Change in Market Capitalization
Economic Value Added	Pearson Correlation	1	-.159
	Sig. (2-tailed)		.503
	N	20	20
Change in Market Capitalization	Pearson Correlation	-.159	1
	Sig. (2-tailed)	.503	
	N	20	20

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

Conclusion & Suggestions

Our test results explain weak and negative correlation between economic value added and changes in market capitalization of the company. This indicate us EVA is not the best method to explain the market value addition of the company. A longer time frame can be taken say 5 year period to test the economic value added method. Thus from our test result we can say that there is no significant relationship between economic value added and market value added by the companies. Also on an average EVA of the companies are negative which indicate us there is no value addition of Nifty Value 20 Index companies during the year 2024-25. Tata Motors generate highest EVA Rs. 43657 Crore and State Bank of India Rs. 311651 Crore during the Year 2024-25 is negative and lowest. Some companies have positive EVA but negative MVA and also some companies MVA is positive but EVA is negative. Also the Mean EVA of Nifty Value 20 companies are negative at Rs 10,103.25 Crore but Mean MVA of the companies is positive at Rs. 8599.15 Crore. Our test results are similar with the research conducted by Archana Singh (2008), who also reported that EVA and MVA are in opposite direction.

References- Journals & Articles-

- Altaf, N. (2016). Economic value added or earnings: What explains market value in Indian firms? Future Business Journal, 2(2), 152-166.
- Biddle, G. C., Bowen, R. M. & Wallace, J. S. (1997). Does EVA beat earnings? Evidence on associations with stock returns and firm values. Journal of accounting and economics, 24(3), 301-336.
- Dave, P. G. (2020). A study of shareholder's value creation of selected auto companies in India using EVA & MVA. Anvesh – 2020, Doctoral Research Conference in Management, 89-95.
- Feltham, G. D., Issac, G. E., Mbagwu, C., & Vaidyanathan, G. (2004). Perhaps EVA does beat earnings - revisiting previous evidence. Journal of Applied Corporate Finance, 16(1), 83-88.
- Fernandez, P. (2019). EVA and cash value added do not measure shareholder value creation. SSRN.
- Hamid, H. N. (2013). Analyzing the Relationship between Economic Value Added and Accounting Variable with Share Market Value in Tehran Stock Exchange. Middle East Journal of Scientific Research, 1589-1591.
- Sharma, A. K. & Kumar, S. (2010). Economic Value Added – Literature Review and Relevant Issues. International Journal of Economics and Finance, 2(2), 200-220.
- Singh, A. (2008). Economic Value Added and Valuation of Indian Companies: An Empirical Study. Ph. D. Thesis, Guru Gobind Singh Indraprastha University, New Delhi.
- Tulsian, P. C. & Bharat, T. (2009). Financial Management. S. Chand Publishing, New Delhi.
- Vipond, T. (2024). Economic Value Added (EVA). Retrieved July 2024, 31, from Corporate Finance Institute: <https://corporatefinanceinstitute.com/resources/valuation/economic-value-added-eva/>

Websites

www.nseindia.com
www.bseindia.com
www.moneycontrol.com
www.screener.in
www.procapital.mohdfaiz.com
www.investing.com

RESEARCH STREAM**A Bi-Annual, Open Access Peer Reviewed International Journal**

Volume 02, Issue 01, April 2025

www.cagrcalculator.net

Appendix

Calculation of Change in Market Capitalization of Nifty Value 20 Index Companies in 2024 - 2025				
S. No.	Name of the Company	Market Cap as on 31/03/2024 (In Rs. Cr.) (1)	Market Cap as on 31/03/2025 (In Rs. Cr.) (2)	Change in Market Cap. (In Rs. Cr.) (2-1)
1	Bajaj Auto Ltd.	255397	220023	-35374
2	BPCL	130895	120814	-10081
3	Britannia Industries Ltd.	118293	118914	621
4	Coal India Ltd.	267658	245400	-22258
5	Dr. Reddy's Lab. Ltd.	102898	95478	-7420
6	Grasim Industries Ltd.	155652	177681	22029
7	HCL Technologies Ltd.	418999	432151	13151
8	Hero Moto Corp Ltd.	93618	74463	-19155
9	Hindalco Industries Ltd.	125899	155362	29463
10	ICICI Bank Ltd.	772717	952733	180015
11	ITC Ltd.	501510	512766	11255
12	Indusind Bank Ltd.	120959	50627	-70332
13	Infosys Ltd.	622019	652332	30313
14	NTPC Ltd.	324475	346753	22277
15	ONGC	337735	309953	-27782
16	Power Grid Cor. Ltd.	257844	270043	12198
17	State Bank of India	671442	688534	17092
18	TCS Ltd.	1417173	1304737	-112436
19	Tata Motors Ltd.	366234	248289	117945
20	Wipro Ltd.	254170	274632	20462

RESEARCH STREAM

A Bi-Annual, Open Access Peer Reviewed International Journal

Volume 02, Issue 01, April 2025

Calculation of Economic Value Added of Nifty Value 20 Index Companies							
S. No.	Name of the Company	EBIT (TTM)	NOPAT EBIT (1-t)	Invested Capital	WACC (In %)	Finance Charge	EVA
		1	2	3	4	5 (3x4)	2-5
1	Bajaj Auto Ltd.	9479	7298	36244	11.1718	4049	3249
2	BPCL	26554	19649	135988	7.6755	10437	9212
3	Britannia Ind. Ltd.	3160	2307	5964	7.6639	457	1850
4	Coal India Ltd.	46610	35889	104013	12.0736	12558	23331
5	Dr. Reddy's Lab. Ltd.	8311	6399	35603	9.5614	3404	2995
6	Grasim Industries Ltd.	27410	19735	251077	8.0912	20315	-580
7	HCL Tech. Ltd.	25139	18100	74666	11.0743	8268	9832
8	Hero Moto Corp Ltd.	5592	4138	19599	12.6707	2483	1655
9	Hindalco Ind. Ltd.	29649	21347	176135	9.1209	16065	5282
10	ICICI Bank Ltd.	-31575	-23365	498196	9.8491	49067	-72432
11	ITC Ltd.	26289	19979	75570	10.8199	8176	11803
12	Indusind Bank Ltd.	156	117	109853	27.7432	30476	30359
13	Infosys Ltd.	38145	27845	99219	11.1395	11052	16793
14	NTPC Ltd.	52392	39817	410281	7.7504	31798	8019
15	ONGC	89625	66322	543765	8.2594	44911	21411
16	Power Grid Cor. Ltd.	38593	32418	214599	8.6102	18477	13941
17	State Bank of India	-58965	-44223	1069712	25.5355	267428	-311651
18	TCS Ltd.	67591	50017	110541	11.0444	12208	37809
19	Tata Motors Ltd.	58122	66131	207611	10.8254	22474	43657
20	Wipro Ltd.	17773	13329	100658	11.1386	11211	2118

RESEARCH STREAM**A Bi-Annual, Open Access Peer Reviewed International Journal**

Volume 02, Issue 01, April 2025

EVA and Change in Market Cap of Nifty Value 20 Index Companies for the year 2024-25			
S. No.	Name of Company	Economic Value Added	Change in Market Cap
		TTM 2024-25	31/03/2025 -31/03/2024
1	Bajaj Auto Ltd.	3249	-35374
2	BPCL	9212	-10081
3	Britannia Industries Ltd.	1850	621
4	Coal India Ltd.	23331	-22258
5	Dr. Reddy's Lab. Ltd.	2995	-7420
6	Grasim Industries Ltd.	-580	22029
7	HCL Technologies Ltd.	9832	13151
8	Hero Moto Corp Ltd.	1655	-19155
9	Hindalco Industries Ltd.	5282	29463
10	ICICI Bank Ltd.	-72432	180015
11	ITC Ltd.	11803	11255
12	Indusind Bank Ltd.	-30359	-70332
13	Infosys Ltd.	16793	30313
14	NTPC Ltd.	8019	22277
15	ONGC	21411	-27782
16	Power Grid Cor. Ltd.	13941	12198
17	State Bank of India	-311651	17092
18	TCS Ltd.	37809	-112436
19	Tata Motors Ltd.	43657	117945
20	Wipro Ltd.	2118	20462
	Mean of Companies	-10103.25	8599.15