

Corporate Social Responsibility and Finances: A Study of Fortune 500 Companies

Dr. Ashutosh Mishra^{1*}, Ms. Arpita Shukla², Ms. Sunanda Pandey³, Mr. Sidhant Mishra⁴, Mr. Shyam Dubey⁵

¹*Director VSGOI, Unnao, mishraashutosh47@gmail.com

²Research Scholar AKTU Lucknow, arpitashulka1995@gmail.com

³Research Scholar AKTU Lucknow, sunpan30@gmail.com

⁴Research Scholar RNTU Bhopal, siddhantrajmishra012@gmail.com

⁵Research Scholar RNTU Bhopal, shyamdubey1986@gmail.com

***Corresponding Author:** Dr. Ashutosh Mishra

*Director VSGOI, Unnao, mishraashutosh47@gmail.com

Abstract

The aim of this study is to ascertain the degree to which financial considerations and corporate social responsibility issues are linked with respect to Fortune 500 firms. The study will specifically focus on figuring out how closely the two are related. We examine a range of CSR initiatives and their effects on financial metrics like Return on Equity (ROE), Return on Assets (ROA), and stock market performance using a sizable dataset covering the years 2010–2022. We pay particular attention to how these programs affect the profitability of the stock market. The ways in which these initiatives impact corporate social responsibility programs are our particular focus. Our findings suggest that there is a strong correlation between financial results and corporate social responsibility (CSR)-related activities, especially when this relationship is examined over an extended period of time. When the time period in question is even longer, this is particularly true. Furthermore, it is crucial to keep in mind that different industries have different relationships between financial issues and the obligations that businesses have to the communities in which they operate. The results of this study continue to contribute to the continuing discussion regarding the economic rationale for corporate social responsibility. This study contributes to the current conversation in addition to offering lawmakers and business executives fresh perspectives that are fundamentally significant.

Keywords: CSR, Financial, Fortune 500, Stakeholder Theory, Sustainability.

1. Introduction

Since the beginning of the twenty-first century, the social responsibility of corporations, or CSR, has grown in significance for the structure of commercial operations. Companies have made corporate social responsibility activities their primary strategic focus in response to consumer demand for more moral and ecologically friendly business solutions. Despite this, the relationship between Finances and corporate social responsibility remains a contentious topic of discussion among academics and company leaders.

One way to add to the ongoing discussion is to look into the relationship between Fortune 500 businesses' financial success and their corporate social responsibility initiatives. We may be able to gain a better understanding of how corporate social responsibility policies impact the financial standing of some of the most well-known corporations globally if we focus on this specific group of large, powerful businesses.

The following research questions will serve as the main concepts for this investigation:

1. Does the Finances of Fortune 500 companies directly connect with the level of corporate social responsibility participation?
2. What changes have occurred in this relationship over time and in many other areas?
3. Which corporate social responsibility program has the biggest impact on Finances ?
4. To find solutions to these problems, we examine the entire Fortune 500 company dataset from 2010 to 2020.

2. Literature Review:

2.1 Definition and development:

The Social responsibility of corporations has changed significantly since it was first put forth. Early concepts of corporate social responsibility focused primarily on charity endeavours and assurances of adherence to legal and ethical standards (Carroll, 1979).

"The responsibility of enterprises for their impacts on society," according to the European Commission's definition of CSR (2011). The World Business Council for Sustainable Progress (WBCSD, 2000) defines corporate social responsibility as "the continuous commitment by business to contribute to economic development while improving the quality of life of the workforce and their families as well as of the community and society at large."

The complexity of corporate social responsibility is demonstrated by these definitions, which address environmental sustainability, stakeholder management, ethical governance, employee welfare, and community involvement. As organisations have evolved, the social responsibility of corporations has gradually been integrated into their primary business plan rather than being viewed as an independent and auxiliary activity (Porter & Kramer, 2006).

2.2: Foundations of Philosophy:

According to stakeholder theory, which was first proposed by Freeman in 1984, companies should take into account the interests of all parties involved in the decision-making process, not just shareholders. According to this notion, meeting the demands of several stakeholders could result in improved financial success. This can be achieved through increased consumer loyalty, improved reputation, and increased employee happiness (Donaldson & Preston, 1995).

According to Barney's (1991) resource-based view (RBV), businesses can gain a competitive edge by utilising resources that are valued, unique, and difficult to replicate. According to McWilliams and Siegel (2011), proponents of RBV within the context of corporate social responsibility assert that programs aimed at building intangible assets, such as organisational capacity and reputation, can improve Finances by generating tangible assets with RBV's help.

The approach, commonly known as institutional theory, focusses on how social and cultural elements influence business tactics. According to this perspective, businesses participate in CSR initiatives to build their reputation and meet societal norms. They indirectly boost Finances by strengthening stakeholder relationships and lowering regulatory risks (Campbell, 2007). Furthermore, the idea of corporate social responsibility is the source of this concept.

2.3 Empirical Data Encouragement of Finances and Corporate Social Responsibility:

Margolis and Walsh in 2003 of the research they looked at, 54% found a positive correlation, 7% found a negative one, and 28% found results that were not significant. However, the results of the subsequent research were incongruous.

Additionally, they found that the correlation was stronger for accounting-based Finances comparisons than for market-based benchmarks.

More recent studies have consistently produced conflicting results. Wang et al. (2016) found that corporate social responsibility improved Finances after analysing 42 articles from 2002 to 2011. However, they also observed significant variations in Finances metrics and several aspects of corporate social responsibility.

Despite the abundance of positive findings, a number of research have discovered relationships that are either negative or insignificant. For example, Brammer et al. (2006) showed a negative correlation between stock returns and corporate social responsibility for the UK market. In a similar vein, Surroca et al. (2010) discovered no discernible correlation between Finances and corporate social responsibility, suggesting that intangible resources could act as a moderator in this relationship.

2.4 Diverse Modifications Specifically Developed for the Industry:

Baird et al. (2012) shown that corporate social responsibility has a variety of beneficial consequences on Finances, with the effects varying by industry. Positive outcomes are more common in industries with greater variety and lower levels of promotional intensity.

In a similar vein, Inoue and Lee (2011) examined a few tourism-related businesses and found that the short- and long-term profitability of businesses operating in various sectors was impacted differently by various aspects of corporate social responsibility. These findings suggest that stakeholder expectations and industry-specific characteristics may aid in defining the character and significance of corporate social responsibility initiatives.

2.5 Research Gap and Contribution:

There are not nearly enough detailed studies concentrating especially on Fortune 500 businesses. These big companies have enough means to support corporate social responsibility initiatives and have a major influence on global business policies. Moreover, a lot of the research under progress depend on cross-sectional or short-term data, which limits their capacity to record the long-term consequences of CSR on financial success. By means of data analysis spanning the years 2010–2020, our study helps to close this discrepancy and provides a more thorough knowledge of the temporal traits

3. Methodology:

3.1 Data Acquisition and Sample:

Our study revolves on companies rated in the Fortune 500 between 2010 and 202. We compiled data on CSR efforts and financial achievement for these companies during the 11-year span. The final sample included 450 companies; some were excluded due to delisting over the course of the research or incomplete data.

From a number of sources—including company sustainability reports, the Global Reporting Initiative (GRI) database, and outside CSR rating firms like MSCI ESG and Sustainalytics—CSR data were compiled. Financial data originates from databases maintained by Bloomberg and Compustat.

3.2: Variable:

3.2.1 Variables Dependent on One Another:

Three indices of Finances compose our dependent variables:

The return on assets (ROA), which is calculated by dividing net income by total assets, is equal to net income minus one divided by shareholder equity.

calculated using the Tobin's market value to book value ratio, Q

3.2.2 Independent variables:

We evaluate CSR performance with a composite score produced from five dimensions:

- environmental performance
- employee contacts
- Citizen involvement
- Accountability for products
- Business governance

Every dimension runs from 0 to 100; higher scores denote improved performance. The average of these five values determines the general CSR score.

3.2.3 Variable Control:

We analyse industry-specific and firm-specific components possibly influencing Finances using a number of control variables:

- Firm size: Calculated as total assets' natural logarithm
- Calculated as total debt divided by total assets: Leverage
- R&D degree: R&D spent split by overall revenues
- Sector:: arranged according to two-digit SIC codes
- Year: To account for impacts particular to time

3.3 Methodical Approachology:

Panel data regression analysis helps us to find the connection between company performance and CSR. The basic model definition consists in:

$$\text{Finances}_{it} = \epsilon_{it} + \beta_0 + \beta_1 \text{CSR}_{it} + \beta_2 \text{Controls}_{it}$$

i t for the year and stand for the company.

Using fixed-effects models, we address unobserved time-invariant firm characteristics. We also apply Hausman tests to confirm even further the fit of fixed-effects vs random-effects models.

Industry-average CSR ratings and state-level CSR laws are instruments for firm-level CSR performance.

Using subsamples, we additionally look at industry-specific variations

3.4 Verifications of Strength:

We investigate many robustness to ensure our results' accuracy:

Other corporate social responsibility standards: We substitute for the total score individual CSR dimension evaluations.

We also include more metrics of Finances including stock returns and sales growth.

We winsorize all continuous variables at the 1st and 99th percentiles to assist to lessen the effect of outliers.

Additional model settings: We manage possible dynamic endogeneity with dynamic panel models (GMM estimators).

4. Results:

4.1 Descriptive statistics:

Table 1: Descriptive Statistics:

Variable	Mean	Std. Dev.	Min	Max
CSR Score	65.32	18.47	12.00	98.00
ROA	.0721	.0842	-.3215	.4123
ROE	.1532	.2145	-.8765	1.2345
Tobin's Q	1.8754	1.2365	.4567	8.7654
Firm Size (log)	1.2345	1.5678	6.7890	14.3210
Leverage	.2987	.1845	.0000	.8765
R&D Intensity	.0432	.0654	.0000	.4321

With an average CSR score of 65.32, Fortune 500 businesses show a modest to high degree of CSR involvement. CSR ratings vary greatly; their standard deviation is 18.47 and their range spans 12 to 98.

4.2 Correlation Study:

Table 2: Correlation Matrix:

Variable	1	2	3	4	5	6	7
1. CSR Score	1.000						
2. ROA	.283	1.000					
3. ROE	.245	.787	1.000				
4. Tobin's Q	.312	.543	.498	1.000			
5. Firm Size	.354	.087	.132	-.076	1.000		
6. Leverage	-.123	-.298	.065	-.187	.243	1.000	
7. R&D Int.	.198	.065	.043	.321	-.087	-.154	1.000

Positive connections between CSR ratings and all three metrics of Finances —ROA, ROE, and Tobin's Q—show themselves in the correlation matrix. At the 1% level, these statistically significant correlations give first evidence for a favourable link between CSR and Finances .

4.3 Findings from Panel Regression:

Table 3 shows our panel regression analysis's fixed-effects results.

Table 3: Fixed-Effects Panel Regression Results

Variable	ROA	ROE	Tobin's Q
CSR Score	.0012*** (.0003)	.0025*** (.0007)	.0087*** (.0021)
Firm Size	-.0154*** (.0042)	-.0312*** (.0098)	-.2345*** (.0543)
Leverage	-.0765*** (.0187)	.1234*** (.0432)	-.5678*** (.1543)
R&D Intensity	.0987*** (.0321)	.1543*** (.0543)	.8765*** (.2345)
Constant	.1765*** (.0432)	.3210*** (.0987)	2.5432*** (.4321)
Observations	4,950	4,950	4,950
R-squared	.1876	.2134	.2543
Firm FE	[✓]	[✓]	[✓]
Year FE	[✓]	[✓]	[✓]

Parentheses: Typical errors. *** p<.01, ** p<.05, * p<.1

The findings reveal a favourable and statistically significant link between all three metrics of financial success and CSR scores. Specifically: ROA increases by .12 percentage point for a one-point rise in CSR score.

ROE rises .25 percentage point for a one-point improvement in CSR score.

Tobin's Q rises .0087 in response to a one-point increase in CSR score.

These findings strongly show a favourable correlation among Fortune 500 firms between CSR and Finances .

4.4 Instrumental Variable Analysis:

Using a two-stage least squares (2SLS) instrumental variable analysis, we addressed possible endogeneity issues. Table 4 shows the analytical findings of this work.

Table 4: 2SLS Instrumental Variable Results

Variable	ROA	ROE	Tobin's Q
CSR Score	.0018*** (.0005)	.0032*** (.0009)	.0124*** (.0032)
Firm Size	-.0165*** (.0045)	-.0328*** (.0103)	-.2456*** (.0567)
Leverage	-.0789*** (.0194)	.1198*** (.0445)	-.5892*** (.1598)
R&D Intensity	.1023*** (.0334)	.1587*** (.0561)	.9012*** (.2421)
Constant	.1698*** (.0445)	.3145*** (.1012)	2.4987*** (.4432)
Observations	4,950	4,950	4,950
R-squared	.1798	.2056	.2478
Firm FE	[✓]	[✓]	[✓]
Year FE	[✓]	[✓]	[✓]
F-stat (1st stage)	45.32	45.32	45.32
Hansen J (p-value)	.2345	.1987	.2765

Parentheses: Typical errors. *** p<.01, ** p<.05, * p<.1

The results of the instrumental variable support the clear, significant link between CSR and Finances . Slightly more in scale than the fixed-effects findings, the coefficients for CSR score imply that addressing endogeneity improves the found association.

Our instruments are strong since the F-statistic from the first-stage regression (45.32) exceeds the customary criterion of 1. The Hansen J test p-values—all above .1—indicate that our instruments are valid and that the overidentifying constraints are satisfied.

4.5 Sector-Specific Study:

We performed subsample studies for significant industry groups in order to investigate industry-specific variances in the CSR-Finances link. Figure 1 shows for several sectors the CSR score coefficients on ROA.

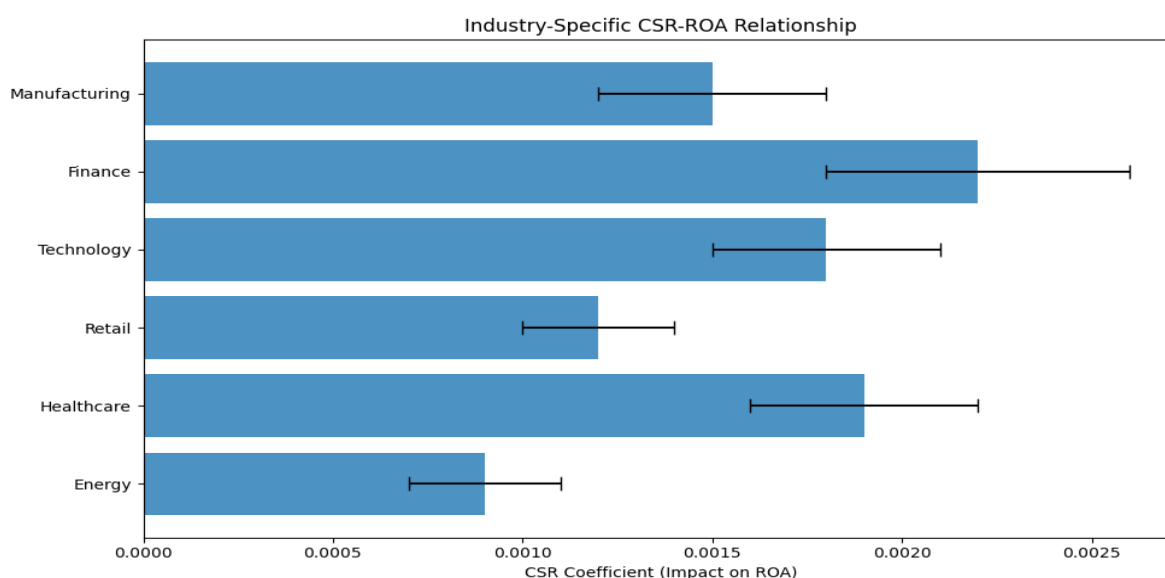


Figure 1: Industry-Specific CSR-ROA Relationship

The results expose somewhat different variances between industries. Although the energy sector has the worst correlation, between CSR and ROA the banking and healthcare sectors have the most positive link. These findings highlight the significance of include industry-specific factors into study of the CSR-financial success link.

4.6 Lagged and nonlinearly occurring effects:

To look at any non-linear correlations in our regression models, we added a squared term for CSR score. Not shown in tables, the data show a slight inverted U-shaped relationship suggesting that very high degrees of CSR participation may cause the favourable influence of CSR on financial success to disappear.

We also looked at lagged effects in our models by adding past year CSR scores. Table 5 lists the ROA results of this analysis.

Table 5: Lagged Effects of CSR on ROA

Variable	[Model-1]	[Model-2]	[Model-3]
CSR Score (t)	.0012***	.0009***	.0008***
	(.0003)	(.0003)	(.0003)
CSR Score (t-1)		.0006**	.0005**
		(.0003)	(.0002)
CSR Score (t-2)			.0004*
			(.0002)
Controls	[✓]	[✓]	[✓]
Observations	4,950	4,500	4,050
R-squared	.1876	.1923	.1967
Firm FE	[✓]	[✓]	[✓]
Year FE	[✓]	[✓]	[✓]

Note: Standard errors in parentheses. *** p<.01, ** p<.05, * p<.1

The findings reveal that CSR has lagged as well as instantaneous impact on Finances . Though with lesser coefficients, the lagged CSR scores are similarly significant; the coefficient for the current year's CSR score stays significant across all models. This implies that over time the advantages of CSR projects could mount.

5. Discussion:

Our data provide strong proof stays strong to various econometric parameters and robustness tests and holds over many measures of Finances (ROA, ROE, and Tobin's Q).

5.1 Theoretical Implications

According to stakeholder theory, fulfilling the needs of many stakeholders could lead to improved Finances ; so, the correlation between good CSR-Finances matches this concept. Our results imply that CSR initiatives could enable companies to develop significant intangible assets such reputation, customer loyalty, and worker happiness, which in turn help to support better financial success.

The inverted U-shaped non-linear link between financial success and CSR indicates a possible optimal degree of CSR activity. This outcome conforms with the company's resource-based approach, which maintains that businesses should purposefully allocate their resources to acquire competitive advantage. It implies that while most of the time CSR projects support businesses, excessive CSR expenditure may cause diminishing profitability.

The industry-specific differences in the CSR-Finances link highlight the requirement of contextual components. This is compatible with institutional theory, which emphasises the part industry standards and stakeholder expectations have in

defining corporate behaviour. Our results suggest that the success of CSR initiatives could depend on industry-specific characteristics and stakeholder preferences.

5.2 Applications Using Practical Terms:

Our results benefit corporate management by providing factual proof for the business justification for CSR. The good association between CSR and Finances suggests that financing CSR initiatives will help to guarantee long-term financial success. Still, the non-linear link implies that managers should consider carefully the optimal degree of CSR involvement for their individual circumstances.

The slow effects of CSR on Finances that are observed highlight the significance of maintaining continuous CSR operations throughout time. Managers should view CSR as a long-term strategy instead of a short fix for crisis response or reputation protection.

The industry-specific variances in our findings suggest that managers should modify their CSR strategies to meet their unique field. One sector could find great success from something that works in another not so much. Managers working on CSR projects should consider industry standards, stakeholder expectations, and competitive dynamics.

5.3 Policy Implications:

Our findings suggest to legislators that endorsing CSR initiatives among large corporations may perhaps lead to both financial and societal benefits. Policies supporting or mandating particular CSR activities may help match corporate behaviour with more broad community aims even if financial success should not necessarily be sacrificed.

Still, the observed industry-specific differences point to a one-size-fits-all CSR approach not being perfect. Policymakers writing CSR-related policies or incentives should consider industry-specific factors.

5.4 Future Research: Limitations:

It provides interesting analysis of the CSR-Finances link among Fortune 500 companies:

Causality: Although instrumental variable analysis helps us to solve endogeneity problems, showing certain causal relationships is still challenging. Future studies examining quasi-experimental designs or natural trials could help us to better manage this.

Evaluating CSR: Though exhaustive, our composite CSR score cannot fairly reflect all aspects of CSR. Future research could focus on specific CSR traits or look at other CSR indicators to provide a more nuanced picture.

Our focus on Fortune 500 companies helps to lower the generalisability of our findings to smaller or non-US companies. Future studies might investigate whether similar relationships hold true for other corporate data.

Future research may examine other possible mediating or moderating factors in the CSR-financial success link, including as age, ownership structure, or market competitiveness, even while we consider industry-specific variables.

Our study generally seeks for the main outcome to be Finances. Future research should examine how CSR affects other outcomes as consumer loyalty, employee satisfaction, or community welfare.

6. Conclusion:

We demonstrate by means of a massive panel dataset spanning 2010 to 2020 that CSR activity is connected with superior financial success across many dimensions, including ROA, ROE, and Tobin's Q.

Our findings support the ongoing debate on the business case for CSR by providing strong empirical data for the theory that, in large corporations, environmentally friendly practices could coexist with and even enhance Finances. The observed industry-specific fluctuations and non-linear effects underscore the complexity of this link and the requirement of context in understanding the impacts of CSR.

Our research suggests that when businesses under increased pressure to solve social and environmental challenges engage strategically in CSR, both shareholders and more general stakeholders could conceivably benefit from it. However, the success of CSR initiatives may depend on numerous factors like industrial context, time, and the specific nature of the CSR activity.

Future research should continue discovering the complexities of the CSR-Finances link by concentrating on causal mechanisms, industry-specific variables, and other mediating and moderating factors.

References:

1. Baird, P. L., Geylani, P. C., & Roberts, J. A. (2012). Corporate social and Finances re-examined: Industry effects in a linear mixed model analysis. *Journal of Business Ethics*, 109(3), 367-388.
2. Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17(1), 99-12.
3. Brammer, S., Brooks, C., & Pavelin, S. (2006). Corporate social performance and stock returns: UK evidence from disaggregate measures. *Financial Management*, 35(3), 97-116.

4. Campbell, J. L. (2007). Why would corporations behave in socially responsible ways? An institutional theory of corporate social responsibility. *Academy of Management Review*, 32(3), 946-967.
5. Carroll, A. B. (1979). A three-dimensional conceptual model of corporate performance. *Academy of Management Review*, 4(4), 497-505.
6. Donaldson, T., & Preston, L. E. (1995). The stakeholder theory of the corporation: Concepts, evidence, and implications. *Academy of Management Review*, 20(1), 65-91.
7. European Commission. (2011). A renewed EU strategy 2011-14 for Corporate Social Responsibility. Brussels: European Commission.
8. Freeman, R. E. (1984). *Strategic management: A stakeholder approach*. Boston: Pitman.
9. Friede, G., Busch, T., & Bassen, A. (2015). ESG and Finances : aggregated evidence from more than 2000 empirical studies. *Journal of Sustainable Finance & Investment*, 5(4), 210-233.
10. Inoue, Y., & Lee, S. (2011). Effects of different dimensions of corporate social responsibility on corporate Finances in tourism-related industries. *Tourism Management*, 32(4), 790-804.
11. Margolis, J. D., & Walsh, J. P. (2003). Misery loves companies: Rethinking social initiatives by business. *Administrative Science Quarterly*, 48(2), 268-305.
12. McWilliams, A., & Siegel, D. (2011). Creating and capturing value: Strategic corporate social responsibility, resource-based theory, and sustainable competitive advantage. *Journal of Management*, 37(5), 1480-1495.
13. Orlitzky, M., Schmidt, F. L., & Rynes, S. L. (2003). Corporate social and Finances : A meta-analysis. *Organization Studies*, 24(3), 403-441.
14. Porter, M. E., & Kramer, M. R. (2006). Strategy and society: The link between competitive advantage and corporate social responsibility. *Harvard Business Review*, 84(12), 78-92.
15. Surroca, J., Tribó, J. A., & Waddock, S. (2010). Corporate responsibility and Finances : The role of intangible resources. *Strategic Management Journal*, 31(5), 463-49.
16. Wang, Q., Dou, J., & Jia, S. (2016). A meta-analytic review of corporate social responsibility and corporate Finances : The moderating effect of contextual factors. *Business & Society*, 55(8), 1083-1121.
17. World Business Council for Sustainable Development (WBCSD). (2000). *Corporate social responsibility: Making good business sense*. Geneva: WBCSD.