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CSR SPENDING IN INDIA: EXPLORING THE LINKAGES WITH BUSINESS GROUP AFFILIATION AND PRODUCT PORTFOLIO DIVERSIFICATION

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Abstract

The present study examines the influences of group affiliations status on a firm's CSR spending and how the group size and interaction of group size and product portfolio diversification influence CSR spending. The sample of the present study covers 1,513 Indian firms coming under the ambit of CSR reporting, represented through the unbalanced panel data set of 4,459 firm years from the year 2014 to 2019. The baseline model regresses CSR spending on the group-affiliation status and set of controlling variables that impact CSR spending by using the panel least squares regression model. The baseline model is extended to test the impact of group size and the interaction of group size and product portfolio diversification on CSR spending. Industry variations in CSR spending are controlled by introducing industry-fixed effects into the regression model. The findings of the study reveal a significant positive impact of group affiliation status on CSR spending. The results are also robust to the group size effect. The findings support the stewardship theory and socio-emotional wealth creation theory of the group-affiliated firm, which asserts that the group affiliated firms experiences a variety of stakeholder demands and social issues. Building a social reputation through CSR activities will help handle such situations. The findings also proved that larger firms with wider product diversification are not encouraged towards CSR spending. This is the first study that tests the impact of group size and the interaction of group size and product portfolio diversification on CSR spending. The study contributes to the literature on how ownership style, especially group affiliation status, influences the social engagement of a firm.

Keywords: ownership style, group affiliation, product portfolio diversification, CSR spending, stewardship theory, socio-emotional wealth theory

1. Introduction

The present study examines how group affiliation, group size, and product portfolio diversification impact CSR spending by firms in India. Strategic investment decision-making, like investment in CSR projects, is mainly influenced by the style of ownership (Baysinger et al., 1991; Chaganti & Damanpour, 1991; Eisenmann, 2002; Kochhar & David, 1996; Zahra, 1996). Emerging markets context is characterized by various ownership styles like family firms, business groups, public firms, multi-national firms, etc. Most family firms in India have business groups and diversified product portfolios. The business groups with larger product diversification experience a wider range of stakeholders' demands and more varieties of social issues. It creates more pressure on the managers of such business groups to be more responsive to various stakeholders like government, business, and financial communities. Such cautious behaviour

of the managers will make them risk-averse compared to non-diversified firms (Hoskisson et al., 1991; Xu & Liu, 2017; Young & Thyil, 2014). All such factors motivate the managers to build strong social reputations and distinguished identification in society (Dyer & Whetten, 2006; Gómez-Mejía et al., 2007; Le Breton-Miller & Miller, 2009), which is possible through actively engaging in CSR projects.

In emerging markets, mostly the managers of the group-affiliated firms are the founder members. It means principals are also acting as agents of the firm. In such cases, the principal managers behave like stewards of the company (Hernandez, 2012) and are interested in the firm's sustainable development (Orlitzky et al., 2003). Such interest strongly motivated them to invest in CSR projects because CSR activities yield sustainable long-run wealth creation. They also strongly associate themselves with reputation, the stakeholders' belongingness, binding social relationships, and engaging in charitable activities rather than concentrating only on financial metrics (Berrone et al., 2010; Cennamo et al., 2012; Gómez-Mejía et al., 2007; Miller & Le Breton-Miller, 2014). Such values are termed as a firm's socio-emotional wealth (Morgan & Gomez-Mejia, 2014, p. 280). With reference to agency theory and socio-emotional wealth perspective, the present study hypothesizes a positive association between group affiliation status and CSR spending. The prior literature supports the positive impact of group affiliation status on CSR spending (Choi et al., 2018; Huang et al., 2021; Manogna & Mishra, 2021; Panicker, 2017).

A reasonable number of studies examine the impact of group affiliation status on CSR spending. However, the prior studies have ignored the impact of group size and product portfolio diversification on CSR engagement, exposing the firms to various stakeholder demands and social issues and forcing the firms to build a social reputation through CSR spending. The prior literature has focused mainly on the impact of corporate diversification on financial performance (Doaei et al., 2014; Doaei et al., 2012; Lee & Jang, 2007; Tanui & Serebemuom, 2021). However, few studies concentrated on the cross-country diversification of business (Brammer et al., 2006; Strike et al., 2006). Only one study was conducted on product diversification (Xu and Liu, 2017). Such studies also have ignored the interaction of group size and product diversification. It indicates the dearth of studies examining the association of product portfolio diversification with CSR spending and exploring how the ownership style of large groups coupled with wider product diversification influences CSR investment, providing useful insights into the social engagement of such firms.

The present study tests the significance of the impact of group affiliation, group size, and product diversification on CSR spending in the sample of 4,459 firm years representing 1,513 Indian firms reporting CSR spending from the year 2014 to 2019. The findings of the study reveal a positive association between group affiliation status and CSR spending. It indicates that group-affiliated firms engage more in CSR activities than non-group-affiliated firms supporting the prior literature (Choi et al., 2018; Huang et al., 2021; Manogna & Mishra, 2021; Panicker, 2017). The extension of the baseline model to test the impact of group size reveals a significant positive impact on CSR spending. However, the interaction of group size and product diversification does not significantly impact CSR spending.

Findings support the stewardship theory and socio-emotional wealth creation from a group-affiliated firms' perspective, which indicates that group-affiliated firms prioritize long-term wealth creation through social reputation (Fernando et al.,2014). The findings also reveal that institutional investment has a significant positive impact on CSR spending, indicating that institutional investors are interested in CSR engagement by their portfolio firms supporting the prior literature (David, Bloom, and Hillman, 2007; Goranova and Ryan, 2014; Panicker, 2017; Nuvaid, Sardar and Chakravarty, 2018; Kim, Park and Roy Song, 2019; Chen, Dong, and Lin, 2020; Tokas and Yadav, 2020; Pradhan and Nibedita, 2021; Manogna and Mishra, 2021). It may be attributed to the fact that the CSR investment by the portfolio firms makes their stocks more resilient to market shocks (Silva, 2021; Song, 2015). This insignificant influence of the interaction term reflecting group size and segment number reveals that companies with greater product diversification prefer to transfer their free cash flows from cash-rich to cash-crunch segments, demotivating them from spending on CSR. More investigation into the dynamics of the relationship between company diversification and the CSR interest of companies is warranted in light of these intriguing findings.

The present study provides both theoretical and practical contributions. The findings strengthen the application of stewardship theory and socio-emotion wealth perspective in group-affiliated firms. The findings also support the stakeholder identification and salience' theory by providing empirical evidence on the positive impact of institutional ownership on CSR spending. Market participants should also consider CSR performance while making their investment decisions.

This paper is divided into five sections. Section one introduces this paper as discussed above; section two discusses the theoretical background, literature review, and hypothesis development; section three narrates the study's methodology; section four explains the results of the analysis, and finally, section five presents the conclusion and implications.

2. Theoretical Background, Literature Review and Hypotheses Development

2.1. Theoretical Support for the Relationship Between Group Affiliation and CSR

The current research proposes a positive relationship between group affiliation status and CSR spending by referencing stewardship theory and the socio-emotional wealth theory. These two theories served as the foundation for the existing literature on the impact of family firms on CSR performance. Similar traits are shared by group-affiliated firms and family firms in emerging markets, especially in the Indian context. This research broadens the application of the stewardship theory and the perspective of social and emotional wealth to the context of group-affiliated firms. Agents who are also firm owners act less like middlemen and more like fiduciaries (Hernandez, 2012). Group-affiliated businesses, in which the promoters typically serve in senior management roles, are ideal for this model. Insider managers put the organization's long-term goals ahead of the shorter-term ones. Studies demonstrate that investment in CSR activities provides sustainable long-term financial returns (Orlitzky et al., 2003). Management focuses on long-term success and maintaining positive relationships with internal and external stakeholders at group-affiliated companies. Because of this, they are prompted to invest in CSR activities.

They identify the performance of their firm with the reputation, belongingness of the stakeholders, binding social relationship, relishing social prestige, achieving credit through generous actions like CSR spending, etc., rather than by mere financial metrics (Berrone et al., 2010; Cennamo et al., 2012; Gómez-Meja et al., 2007; Miller & Le Breton-Miller, 2014). Such values create the company's "social and emotional wealth capital" (Morgan & Gomez-Mejia, 2014, p. 280). Socio-emotional wealth is the intangible benefit the family firm's owners accrued due to their participation in socially responsible endeavours with far-reaching effects on the company's constituents.

With reference to stewardship theory, socio-emotional wealth theory, and motivation drawn from prior literature, the present study proposes the following hypothesis.

H1: Group affiliation status significantly impacts the CSR spending of the firms.

2.2. Literature on the Relationship between Group Affiliation and CSR

The literature review identified the following studies examining the relationship between group-affiliated firms and their CSR spending (Choi et al.,2018; Guo et al., 2018; Huang et al., 2021; Lee, 2018; Manogna and Mishra, 2021; Panicker,2017).

According to Panicker (2017), various attitudes and approaches to CSR spending exist among institutional owners. He unearthed that while group firms, family firm promoters, and foreign institutional investors all support CSR initiatives, the interests of individual promoters do not. Choi et al. (2018) argued for a negative impact of insider shareholders' interest on CSR performance and a positive association between group affiliation and CSR performance. The research demonstrated both a positive effect of group membership and a negative effect of insider shareholders. Following the 'insurance theory,' the research also demonstrated that group-affiliated firms participate in CSR initiatives to increase their reputational capital and thereby increase their resilience to adverse events.

According to Huang et al. (2021), companies with ties to larger groups are more likely to prioritize social welfare than those operating independently. The findings showed a positive link between membership in a group and CSR spending. Additionally, the results demonstrated that affiliated firms emphasize social, employee, and consumer responsibility more than standalone firms. According to Manogna and Mishra (2021), a company's affiliation with a business group influences CSR spending positively compared to the unaffiliated group of companies. According to Lee (2018), it is common for affiliated group firms to funnel funds from more successful firms to those struggling. There is no incentive for the group firms to invest in CSR in such situations. Evidence from the Korean market corroborated this view, demonstrating a negative correlation between membership in a group and CSR spending.

2.3. How Does Product Portfolio Diversification Influence CSR?

According to a study by Xu and Liu (2017), a rise in the diversification of company operations leads to an increase in CSR spending for four reasons. To begin, the increased variety of company activities and stakeholder groups arising from increased corporate diversification raises a greater number of societal concerns. In the end, it results in increased pressure from the public to be more responsible for the various interests held by the many stakeholders. Second, in contrast to the managers of non-diversified organizations, those of diversified firms have a lower tolerance for risk (Hoskisson et al., 1991). Because of this, they are forced to respond to the demands of the numerous stakeholders with increased caution, as well as deal with a variety of societal issues. Thirdly, when companies diversify into many different business segments unrelated to one another, the cash flows from those diverse company segments are least associated with one another. It instils a sense of responsibility in the managers, encouraging them to make decisions regarding social issues. Fourthly, when company conglomerates have different business divisions that are unrelated to one another, they will encounter a wide range of societal concerns. A greater likelihood of being affected by social concerns compels managers to increase their corporate social responsibility (CSR) spending to reduce the impact of those issues. Companies with greater group affiliations and wider product variety are strongly driven to invest in CSR because of their far-reaching influence on a range of social problems and the ability to influence the welfare of different stakeholders.

According to what has been discussed thus far, increasing the scope and scale of a company's commercial operations inevitably results in greater vulnerability to the risk posed by its many different market sectors. Diversified companies are investing more money into corporate social responsibility to protect themselves from the perils of business and the market. So, the present study hypothesizes a positive association between product diversification and its interaction with group size and CSR spending.

H1: Firms with larger group sizes and wider product diversification invest more in projects relating to corporate social responsibility.

2.4. Literature Supporting the Relationship Between Product Diversification and CSR

According to Brammer et al. (2006), a company's level of geographical diversification affects its corporate social performance. The research showed that expanding into other regions improved companies' social performance. Although geographical diversity is associated with several aspects of corporate social responsibility, results do not hold across Europe. It has been argued by Strike et al. (2006) that worldwide expansion is beneficial. When companies with a global footprint behave ethically, value is created; otherwise, it is destroyed. According to the study's findings, there is a correlation between increased levels of international complexity and irresponsibility. Production diversification increases the number of stakeholder demands and social challenges, according to Xu and Liu (2017), who claim that this leads diversified companies to increase their CSR efforts. The results showed a positive correlation between production diversity and CSR efforts. The correlation was higher when companies diversified into unrelated products rather than related products. Furthermore, the study suggested that CSR performance is a reasonable stand-in for long-term success.

Only three papers were found in the literature examining the correlation between Product diversification and CSR. Two studies deal with the international expansion of businesses (Brammer et al., 2006; Strike et al., 2006), while the third examines product diversification (Xu and Liu,2017). In addition, Strike et al. (2006) concentrated on a particular aspect of corporate social responsibility, specifically environmental performance. Research into the link between corporate social responsibility expenditures and product diversification is scarce. This research contributes to the literature by investigating the impact of group-linked companies' product portfolio diversity on their CSR investment. The prior literature overlooked group affiliation and group size when evaluating the connection between product diversification and CSR. Investigating the relationship between the size of the group and the variety of products sold will yield illuminating information regarding how large group companies address the growing number of social issues, and challenges stakeholders pose by product portfolio diversity.

3. Data and Methodology

3.1. Sample and Data Sources

The present study sample consists of all the listed companies in India that come under the ambit of CSR regulations and report CSR spending-related information in their annual reports. The study period is from 2014 to 2019, representing 4,459 firm years. The data relating to the required variables have been collected from the Centre for Monitoring Indian Economy (CMIE) database.

Clusters used in designing the empirical model: The baseline model consists of 4,459 firm years, distributed over 46 distinct industrial clusters according to the National Industrial Classification (NIC). The sample was selected from all 46 industrial groups that fall under corporate social responsibility (CSR) according to the companies act 2013, which is in effect in India. The pharmaceutical industry, the iron and steel industry, the fast-moving consumer goods industry, the hotel industry, the electrical and electronic products industry, banking, and other financial service industries, etc., are a few examples of the industries which are included in the sample of the study.

3.2 Empirical Model

$$CSR_{it} = \alpha_0 + \beta_1 GAF_{it} + \gamma_1 PROM_{it} + \gamma_2 INT_{it} + \gamma_3 ROA_{it} + \gamma_4 CASH_{it} + \gamma_5 LEV_{it} + \gamma_6 AGE_{it} + \gamma_7 SIZE_{it} + \gamma_8 avgCSR_{it} + \varepsilon_{it} \quad (1)$$

$$CSR_{it} = \alpha_0 + \beta_1 GRSIZE_{it} + \gamma_1 PROM_{it} + \gamma_2 INT_{it} + \gamma_3 ROA_{it} + \gamma_4 CASH_{it} + \gamma_5 LEV_{it} + \gamma_6 AGE_{it} + \gamma_7 SIZE_{it} + \gamma_8 avgCSR_{it} + \varepsilon_{it} \quad (2)$$

$$CSR_{it} = \alpha_0 + \beta_1 GRSIZE_{it} * SEG_{it} + \beta_2 GRSIZE_{it} + \beta_3 SEG_{it} + \gamma_1 PROM_{it} + \gamma_2 INT_{it} + \gamma_3 ROA_{it} + \gamma_4 CASH_{it} + \gamma_5 LEV_{it} + \gamma_6 AGE_{it} + \gamma_7 SIZE_{it} + \gamma_8 avgCSR_{it} + \varepsilon_{it} \quad (3)$$

In equations *(1)* ,*(2)* and *(3)*, CSR_{it} is the log value of CSR spending; GAF_{it} is group affiliation status; $GRSIZE_{it}$is group size;SEG_{it}refers to a number of business segments under operation by a company; $GRSIZE_{it} * SEG_{it}$is the interaction of group size and product diversification; $PROM_{it}$is promote holdings; INT_{it} is an institutional investment; ROA_{it} denotes profitability measured as 'Return on Assets'; $CASH_{it}$ measured as cash holding; LEV_{it} stands for leverage, measured as a debt-to-equity ratio; AGE_{it}denotes firm age; $SIZE_{it}$ denotes the size of the company measured as log value of total assets and $avgCSR_{it}$measured as log value of average CSR spending.

In this research, we utilize three distinct metrics to assess the scale and complexity of businesses. The first is the log value of the company's assets in the current period (denoted SIZEit), the second is the log

value of the company's groups (denoted GRSIZEit), and the third is the number of business segments the company operates in (denoted a SEGit).

Empirical model testing occurs within a panel data regression framework. We begin by performing the regression on the pooled dataset without incorporating the fixed effects in the analysis. The present research added industry fixed effect dummies to the model to make the pooled data regression results more robust against the variations across the industry. According to the national industrial classification (NIC), which uses a two-digit code to categorize businesses at a broader level, 46 distinct industries are represented in the sample. To account for this, 45 dummy variables representing different industries have been added to the regression leaving one industry group as the reference group.

Once the significance of the baseline regression model is established (refer to equation (1)), the study continues to analyze the effect of group size on CSR spending (refer to equation (2)) while continuing to control for the other firm-specific variables. Lastly, the research investigates whether or not the complexity of a business, which is represented here by product diversification, affects CSR, as well as whether or not this effect interacts with group size (refer to equation 3)

4. Results of the Analysis

4.1. Descriptive Statistics and Correlation Analysis

Table 1 provides descriptive statistics for the CSR_{it} and other variables used in the empirical model. CSR_{it} has a mean value of 2.143 and a standard deviation of 1.927, with a slightly right-skewed leptokurtic distribution. The mean value for $PROM_{it}$ is 0.583, with a standard deviation of 0.156. Other control variables INT_{it}, LEV_{it}, ROA_{it}, $CASH_{it}$, AGE_{it}, $SIZE_{it}$ and $avgCSR_{it}$ shows mean value of 0.123, 0.628, 7.093, 4.810, 37.469, 9.251 and 3.661, while standard deviation values are 0.145, 1.082, 5.524, 2.368, 21.436, 1.807 and 1.071 respectively.

Table 1: Descriptive Statistics

	CSR_{it}	$PROM_{it}$	INT_{it}	LEV_{it}	ROA_{it}	$CASH_{it}$	AGE_{it}	$SIZE_{it}$	$avgCSR_{it}$
Mean	2.143	0.583	0.123	0.628	7.093	4.810	37.469	9.251	3.661
Median	1.946	0.608	0.071	0.290	5.810	4.669	32.000	9.036	3.517
Maximum	9.047	1.000	0.891	9.930	29.760	14.022	150.000	16.337	7.053
Minimum	-2.303	0.000	-0.076	0.000	0.020	-2.303	2.000	5.177	-2.303
Std. Dev.	1.927	0.156	0.145	1.082	5.524	2.368	21.436	1.807	1.071
Skewness	0.480	-0.936	1.439	4.195	1.209	0.424	1.391	0.811	0.357
Kurtosis	3.170	4.245	5.025	26.236	4.416	3.581	5.080	3.766	3.926
Observations	4459	4459	4459	4459	4459	4459	4459	4459	4459

Table 2 shows the relationship between all the variables, dependent, independent, and control variables. CSR_{it} has a significantly strong correlation with promoter holding, indicating that increasing promoter holding results in decreased CSR spending by the firm. CSR spending also reported a significant positive relationship with all the control variables in the model. A high degree of positive correlation is found with firm size followed by institutional investment. Promoter holdings confirm significant negative relation with all the control variables. Relationships between all the controllable variables are concerned, majority of combinations reported significant positive relation. Some combinations like debt with ROA_{it} and firm age, ROA_{it} with firm age and firm size, and firm age with industry average CSR spending have sown negative correlation.

Table 2: Correlation Analysis

Probability	CSR_{it}	$PROM_{it}$	INT_{it}	LEV_{it}	ROA_{it}	$CASH_{it}$	AGE_{it}	$SIZE_{it}$	$avgCSR_{it}$
CSR_{it}	1.000								
$PROM_{it}$	-0.168***	1.000							
TII_{it}	0.639***	-0.522***	1.000						
$LEVit$	0.050***	-0.066***	0.062***	1.000					
ROA_{it}	0.180***	0.043***	0.065***	-0.330***	1.000				
$CASH_{it}$	0.637***	-0.183***	0.557***	0.100***	0.039***	1.000			
AGE_{it}	0.187***	-0.027***	0.082***	-0.090***	-0.040***	0.154***	1.000		
$SIZE_{it}$	0.816***	-0.223***	0.684***	0.258***	-0.112***	0.706***	0.181***	1.000	
$avgCSR_{it}$	0.291***	-0.074***	0.206***	0.065***	0.029***	0.230***	-0.001***	0.332***	1.000

4.2. Relationship between Group Affiliation Status and CSR Spending

Table 3: Group Affiliation Status and CSR spending

Variable	Symbol	Without Industry Fixed Effects				With Industry Fixed Effects			
		Coefficient	Std. Error	t-Statistic	Prob.	Coefficient	Std. Error	t-Statistic	Prob.
Group Affiliation Dummy	GAF_{it}	0.171	0.032	5.404	0.000	0.168	0.032	5.260	0.000
Promoter Holdings	$PROM_{it}$	0.626	0.112	5.600	0.000	0.565	0.113	4.989	0.000
Institutional Investment	INT_{it}	1.453	0.165	8.791	0.000	1.668	0.169	9.866	0.000
Leverage	LEV_{it}	-0.127	0.015	-8.627	0.000	-0.084	0.015	-5.451	0.000
Return On Assets	ROA_{it}	0.081	0.003	28.719	0.000	0.074	0.003	25.300	0.000
Cash Holding	$CASH_{it}$	0.037	0.009	4.259	0.000	0.039	0.009	4.375	0.000
Firm Age	AGE_{it}	0.003	0.001	4.095	0.000	0.003	0.001	3.867	0.000
Firm Size	$SIZE_{it}$	0.787	0.015	52.165	0.000	0.784	0.015	51.199	0.000
Industry CSR Spending	$avgCSR_{it}$	0.015	0.014	1.058	0.290	0.231	0.037	6.325	0.000
Constant		-6.608	0.119	-55.517	0.000	-7.146	0.173	-41.242	0.000
					Value				Value
R-squared					0.755				0.776
Adjusted R-squared					0.755				0.773
F-statistic					1,525.953				274.110
Prob(F-statistic)					0.000				0
No. of firm-years					4459				4459
No. of firms					1513				1513
Industry-fixed effects					NO				YES
Study period					2014 -2019				2014 -2019

The results of panel regression (table 3) disclose that GAF_{it} has a significant positive impact on CSR_{it}. It shows that a 1% increase in GAF_{it} will result in 0.168 percent higher CSR_{it} when industry-fixed effects are applied. The analysis findings reveal that group affiliation improves CSR spending, implying that group-affiliated firms engage in more CSR activities. Findings align with prior literature (Choi et al., 2018; Huang et al., 2021; Manogna & Mishra, 2021; Panicker, 2017). There is a marginal difference in the impact of GAF_{it} on CSR_{it} when the industry fixed effects are not controlled. It implies that industry variations have no significant impact on the relationship between group affiliation status and CSR spending. The findings align with stewardship theory and the socio-emotional wealth view of group-affiliated firms, which argues that group-affiliated firms prioritize their goals towards socio-emotional wealth creation(Fernando et al., 2014). Such firms are highly concerned about the local community (Berrone et al., 2010; Young & Thyil, 2014). It can be inferred that group-affiliated firms are more alarmed about the costs associated with reputation and litigation risk. To minimize such risk, they are motivated to invest more in CSR activities (Chen et al., 2008).

The findings also reveal that $PROM_{it}$ and INT_{it} have a significant positive impact on CSR_{it}. All the remaining controlling variables, except LEV_{it} have a significant negative impact on CSR_{it}. On the other hand, LEV_{it} has significant negative impact. The high adjusted R Squared value confirms that the model fits well. The F-statistic value indicates that the model's independent variables may define the optimal variations in the dependent variable.

4.3. Relationship between Group Size and CSR spending

Having proven the significant positive impact of group affiliation status on CSR spending, the analysis is extended to explore the impact of group size on CSR spending. Prior literature has ignored the group size effect, which is one of the important factors determining the complexity of stakeholders' demand and social issues faced by the diversified firms. As the group size increases, its stakeholder engagement and exposure to a diversified environment also increase. It will have an impact on the CSR motives of the firm. Hence, to test the robustness of the relationship of group affiliation status with CSR spending, the study also extends to analyze the impact of group size.

Table 4: **Group Size and CSR Spending**

Variable	Symbol	Without Industry Fixed Effects				With Industry Fixed Effects			
		Coefficient	Std. Error	t-Statistic	Prob.	Coefficient	Std. Error	t-Statistic	Prob.
Group Size	GRSIZE	0.026	0.013	2.005	0.045	0.023	0.013	1.690	0.091
Promoter Holdings	PROM	0.345	0.157	2.199	0.028	0.052	0.158	0.327	0.744
Institutional Investment	INT	1.296	0.216	5.993	0.000	1.297	0.219	5.924	0.000
Leverage	LEV	-0.100	0.017	-5.916	0.000	-0.034	0.017	-2.034	0.042
Return On Assets	ROA	0.088	0.004	24.032	0.000	0.080	0.004	21.075	0.000
Cash Holding	CASH	0.042	0.011	3.678	0.000	0.037	0.011	3.323	0.001
Firm Age	AGE	0.140	0.032	4.365	0.000	0.141	0.033	4.240	0.000
Firm Size	SIZE	0.807	0.018	43.895	0.000	0.807	0.019	43.307	0.000
Industry CSR Spending	avgCSR	0.010	0.019	0.542	0.588	0.335	0.069	4.851	0.000
Constant		-6.957	0.189	-36.853	0.000	-7.223	0.354	-20.401	0.000
					Value				Value
R-squared					0.771				0.804
Adjusted R-squared					0.771				0.798
F-statistic					946.282				157.795
Prob(F-statistic)					0				0
No. of firm-years					2535				2455
No. of firms					795				790
Industry-fixed effects					NO				YES
Study period					2014 - 19				2014-19

The results of panel regression (table 4) disclose that $GRSIZE_{it}$ has a significant positive impact on CSR expenditure. It shows that a 1 percent increase in $GRSIZE_{it}$ will result in 0.023 percent higher CSR_{it} when the industry effects are applied. The impact is marginally high when industry effects are not controlled. The findings of the analysis reveal that large group size improves CSR spending. It means conglomerates with many members are strongly motivated to spend on CSR. Because larger firms with greater wealth can provide additional capital and resources to their group members via the internal financing market, firms affiliated with such groups are more likely to engage in CSR activities(Zeng, 2020).

The impact of INT_{it} is also significantly positive on the CSR_{it}, indicating that institutional investors promote CSR spending through their portfolio firms(David, Bloom, and Hillman, 2007; Goranova and Ryan, 2014; Panicker, 2017; Nuvaid, Sardar, and Chakravarty, 2018; Kim, Park, and Roy Song, 2019; Chen, Dong, and Lin, 2020; Tokas and Yadav, 2020; Pradhan and Nibedita, 2021; Manogna and Mishra, 2021). It indicates stronger activism of institutional investors in group affiliated firms in India in making their portfolio firms accept the CSR-related proposals. The potential benefits of CSR investment, like social reputation, more

resilience to the stock price crash risk, etc., motivate institutional investors to promote CSR investment by their portfolio firms (Silva, 2021; Song, 2015).

The findings also reveal that $PROM_{it}$ does not have a significant impact on CSR_{it} when industry-fixed effects are controlled. On the other hand, the significant negative impact of LEV_{it} implies that firms with more debt in their capital structure are less motivated to spend more on CSR. It may be due to non-availability of sufficient cash flows to spend on CSR. The significant positive impact of $avgCSR_{it}$ indicates that peer-group effect is very strong in group-affiliated firms.

The other controlling variables like $CASH_{it}$, AGE_{it}, $SIZE_{it}$ and ROA_{it} are having a significant positive impact. The F-statistic value is significant in all the regression models which indicate significant fit of the model.

4.4 How Interaction of Group Size and Product Diversification Influences the CSR Spending

The growth of the firm can take place in two different ways. One is acquiring other firms through takeovers and increasing the size of the group, and another way is to diversify the product line into various business segments. Product diversification and expanding group size intensify the firm's complexity by attracting demands from varied stakeholders and more social issues. Prior literature has studied the impact of product diversification and group affiliation status on CSR in isolation. No prior studies have tested the interaction of group size and product diversification in motivating CSR spending. The present study tries to fill this gap by testing the impact of the group size and product diversification interaction on the CSR spending of the group firms in India.

Table 5: Interaction Effect of Group Size and Product Diversification on CSR Spending

Variable	Symbol	Coefficient	Std. Error	t-Statistic	Prob.
Interaction of Group Size & Segments	GRSIZE*SEG	0.007	0.016	0.470	0.638
Group Size	GRSIZE	0.076	0.051	1.493	0.136
Segment Count	SEG	-0.060	0.046	-1.298	0.195
Promoter Holdings	PROM	-0.243	0.271	-0.895	0.371
institutional investment	INT	1.594	0.384	4.150	0.000
Leverage	LEV	-0.104	0.043	-2.444	0.015
return on assets	ROA	0.097	0.007	14.856	0.000
Cash Holding	CASH	-0.018	0.020	-0.934	0.350
Firm Age	AGE	0.043	0.058	0.744	0.457
Firm Size	SIZE	0.787	0.032	24.742	0.000
industry CSR spending	avgCSR	0.059	0.034	1.738	0.083
Constant		-5.963	0.344	-17.315	0.000
R-squared		0.777	No. of firm-years		904
Adjusted R-squared		0.774	No. of firms		318
F-statistic		282.032	Study period		2014-2019

The GRSIZE*SEG interaction has an insignificant positive impact on CSR (table 5). The findings do not correspond with the findings of the previous research, which suggests a significant link between product diversification and the CSR activity of companies (Brammer et al., 2006; Strike et al., 2006; Xu & Liu, 2017). It suggests that large group companies with a wider range of product lines are not motivated to spend money on CSR initiatives. It may be attributed to the fact that the companies with larger product diversification prefer to transfer their free cash flows from the cash-rich segment to the cash-crunch segment, which demotivates them from spending on CSR. Such intriguing findings call for additional research into the dynamics of the relationship between business diversification and the CSR interest of companies. Other factors that have a significant positive impact include institutional investment, return on assets, firm size, and CSR spending relative to the sector average. The F-statistic meets the criteria for statistical significance, showing that the model is a good fit for the data.

5. Conclusion and Implications

5.1. Conclusion

The present study aims to test the impact of group affiliation and product diversification on CSR spending. With reference to stewardship theory and the socio-emotional wealth view, the present study hypothesizes a positive association between group affiliation and CSR spending. The study's findings proved the significant positive impact of group affiliation on CSR spending, indicating the group firms' social concern. It motivates the authors to examine how the size of the group influences CSR spending. Though an increase in group size strengthens the group's competitive advantages, it also invites a wide variety of social issues and demands from the stakeholders. To deal with such situations, large business groups are motivated to spend more on CSR activities, which help in creating social status and also help in tackling social issues effectively. The study's findings also support the significant impact of group size on CSR spending.

Product diversification also invites a variety of social issues and stakeholders' demands. Hence, firms with diversified product portfolios are more cautious in dealing with social issues and stakeholders' demands. To capture the interaction effect of group size and product diversification, the present study introduced interaction terms in the regression model. The findings proved the insignificant impact of such interaction. Such results may indicate funds transfer from cash-rich to cash-crunch segments, demotivating them from spending on CSR. These intriguing findings demand further research into the relationship between firm’s product diversification and CSR interest.

5.2. Implications of the Study

The present study provides both theoretical and practical implications. The findings corroborate the' stewardship theory' and' socio-emotional wealth creation view' by providing empirical evidence on the positive association of group affiliation and group size with CSR spending. The significant positive impact of institutional investors on CSR spending supports stakeholder identification and salience theory.

The findings of the study draw the attention of the market participants. It shows the motivation of the group-affiliated firms towards sustainable performance and value creation in the long run. Retail investors should be cautious while investing in large group firms with wider product diversification because such firms are exposed to various social issues and stakeholders' demands. The success of such firms depends on how effectively they create a social reputation, especially through CSR activities. The investors should read the integrated annual reports of the large group firms to understand how effectively they align their business interests with social interests. The significant positive impact of institutional ownership on CSR spending also signifies the effective monitoring role played by large-size block-holders in aligning the stakeholders' interest towards long-term value creation.

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