

**How Corporate Environmental Ethics (Non-Financial Information)  
influence Individual Investor's Trading Behavior?  
Mediating Role of Corporate Reputation and Corporate Social  
Responsibility Belief**

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**Abstract**

*This study by using structural equation modeling empirically determine the significant effect of corporate environmental ethics on trading behavior via incorporating the mediating role of corporate reputation and CSR belief. The cross-sectional data was collected from multiple respondents who remain engage in stock purchasing and selling at Pakistan Stock Exchange. The convenient sampling technique was used to determine the appropriate sample size. The empirical results of this study demonstrate that corporate environmental ethics of organizations remain positively and significantly associated with perceived corporate reputation and CSR belief. The statistical analysis also indicates that corporate environmental ethics significantly impacts individual investor's trading behavior. The findings of the study suggest that corporate environmental ethics not only affect investor's trading behavior, but also spur perceived corporate reputation. Perceived corporate reputation postulates competitive edge and significantly affects the decision making behavior of investor's. The findings of the study advocate that companies listed on Pakistan stock exchange should pay more attention to corporate environmental ethics because it is prudent to determine the level of corporate reputation and trading behavior of individual investor.*

**Keywords:** Corporate environmental ethics, CSR belief, Individual investor trading behavior.

**Introduction**

Companies may determine to adopt environmental management because of external stakeholder pressures. Though neoclassical economists advocate that maximizing shareholders' wealth as companies' main goal, institutional theory focus on the impacts of stakeholders about firms'

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strategies (Welford, 2016). It indicates that companies' sole aim is not always profit maximization, and their activities usually meet stakeholder pressures for legitimacy. Consumer activism and regulatory pressure have often been named as a potential factor contributing to this development (Cai, Cui, & Jo, 2016). Scientific evidence is creating a consensus that economic growth has placed an unsustainable burden on the physical environment. Therefore, it is widely inferred by studies expounded in previous literature that companies due diligence about environment leads to thrive material benefits (Jo, Kim, & Park, 2015). Dögl and Holtbrügge (2014), holds the view that companies have social responsibilities that may reinforce their economic objectives and companies undertake environmental management because they hope to be socially responsible (Amann et al., 2007).

Corporate environmental ethics also term as non-financial information which have a potential to influence the stakeholder perception about an entity. The corporate environmental ethics as a non-financial information reflects the management concerns about sustainability and long term going concern. The question of how corporations can respond and manage environmental crises has been examined by various studies expounded in literature (Schwartz, 2017; Walsh & Beatty, 2007; Walsh, Mitchell, Jackson, & Beatty, 2009). The question of how environmental consideration by the corporations affects various stakeholders requires further empirical investigation (Welford, 2016). Past studies have overlooked the perspective of individual investor about environmental ethics and its influence on their trading behavior.

Corporate Environmental ethics also leads to build corporate reputation which postulate competitive edge and various other favorable outcomes for companies (Du et al., 2014). A growing stream of research demonstrates that corporate reputation and identity represent competitive advantage and economic benefits. The corporate reputation has been conceptualized as the public recognition it receives, and social approval of it (Walsh, Mitchell, Jackson, & Beatty, 2009). At extreme level, corporate reputation serves as an intangible asset which allows stakeholders to distinguish a corporation that has a high reputation from corporation without this asset (Walsh & Beatty, 2007). The perceived corporate reputation can provide abundant monetary and non-monetary advantages such as better access to resources, low cost of doing business, and greater chances of financial success (Arli, Grace, Palmer, & Pham, 2017).

The companies build corporate reputation by sending certain clues to stakeholder which in turn affect stakeholder perspective and

willingness to interact with companies (Kaur & Kaushik, 2016). The signaling theory adhere to this notion by proclaiming that firms send signals through their policies and procedure to build favorable corporate reputation. The integration of environment in company's vision and marketing events is one of the dimensions of perceived corporate reputation. It is largely perceived by various stakeholders that companies which remain environmental friendly and have environmental policies are more reliable and transparent (Jo et al., 2015). The companies have various types of stakeholders and they perceive the corporate reputation in terms of their own perception and need.

Individual investor remains one of the most important stakeholders of a corporation and remains prudent to affect organizational policies and procedure. In the context of investor today one of the forces increasing the value of corporate reputation is the expansion of equity market which remains crucial to raise capital (Chang, 2011). If investor perceives reputation reflect the credibility and going concern of a business entity, the reputation will positively affect perception of investor (Dögl & Holtbrügge, 2014). Therefore, the main concern of this study is to examine the influence of corporate environmental ethics and individual investor trading behavior by examining the mediating role of perceived corporate reputation and CSR belief.

## Literature Review & Hypothesis Development

### *Corporate Environmental Ethics*

The main concern of companies not always remains profit maximization, and to legitimize their presence they have to meet the mandate of external stakeholders (Cai et al., 2016). To gain the sense of reliability and trust, organizations tried to integrate environmental concern in their policies and procedure (Schwartz, 2017). Though it is not always the case that environmental management may instantly result into profits in the short term, but it may be economically material in long term (Reverte et al., 2016).

Adhering this notion, stakeholder theory postulate that organizations should consider the interest of stakeholder while formulating their policies to gain the trust and support for their legitimacy (Ortas et al., 2015). Organizations should integrate their short term goals with long term objectives to sustain the sound economic growth and favorable image in the society (Ortas et al., 2015). Organizations should embrace a strategic outlook that should base on non-monetary goals to

respond the stakeholders and institutional pressures (Welford, 2016; Ni & Van Wart, 2015).

*Corporate Environmental Ethics and Perceived Corporate Reputation*

According to Walsh et al., (2009), corporate reputation tends to impact stakeholder commitment, satisfaction and customer word of mouth. In addition to these outcomes past studies have revealed other outcome that result from a favorable reputation. Particularly, Walsh and Beatty (2007), advocate that “a strong corporate reputation can reduce transaction costs and perceived risk of stakeholders”.

However, there are limited evidences which directly correlate that how corporate environmental ethics is beneficial to build favorable corporate reputation. Though it remains one of the major dimensions of corporate reputation however, academic evidence remains limited to directly link the corporate environmental ethics and perceived corporate reputation. Moreover, past studies have largely devoted their effort to understand the possible consequences of reputation in the context of developing economics (Kourtidis et al., 2011). This therefore; raises the question that this gap is an important oversight to understand how corporate environmental ethics determine the level of corporate reputation. The contextual setting of the study will be provided by the individual investor trading at Pakistan stock exchange (PSX). On the basis of substantive literature and logical reasoning the first hypothesis of the study is formulated as:

**H<sub>1</sub>:** *Corporate environmental ethics is positively and significantly associated with perceived corporate reputation in the context of individual investor trading at Pakistan stock exchange (PSX).*

Corporate reputation not only serves as a function of performance indicator, but can also function as a stock choice criterion. Individual investors do not always remain concerned about high dividends or share appreciation (Reverte et al., 2016). Though return on stocks remains crucial in determining investment decisions however, corporate reputation extends the scale of stock significance. Accordingly this study incorporate perceived corporate reputation as a mediating variable. Extending this notion the following hypothesis is proposed:

**H<sub>2</sub>:** *Corporate environmental ethics is positively and significantly associated with trading behavior in the context of individual investor trading at Pakistan stock exchange (PSX).*

**H<sub>3</sub>:** *Perceived corporate reputation positively and significantly mediate the relationship between corporate environmental ethics and trading*

*behavior in the context of individual investor trading at Pakistan stock exchange (PSX).*

#### *Corporate Environmental Ethics and CSR Belief*

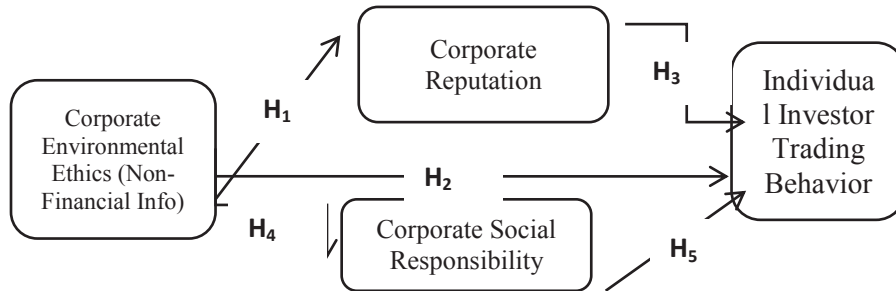
The rise in environmentalism and stakeholder activism reflect the social rights and demands raised by the internal and external stakeholders of the organization. Though stakeholder mostly remains concern about financial outcomes however last, decade have witness an activism about social and environmental concern. It is largely advocated by previous studies that organization which remain socially responsible also remain reliable and financial dealing (Ortas et al., 2015). Extending this notion the study proposes the following hypothesis:

**H<sub>4</sub>:** *Corporate environmental ethics is positively and significantly associated with CSR belief in the context of individual investor trading at Pakistan stock exchange (PSX).*

**H<sub>5</sub>:** *CSR belief positively and significantly mediates the relationship between corporate environmental ethics and trading behavior in the context of individual investor trading at Pakistan stock exchange (PSX).*

#### **Methodology**

Based on previous studies, questionnaire items for the survey are adopted to enhance the reliability and validity of the measures. The multiple items relevant to corporate environmental ethics has adopted from (Chang, 2011), trading behavior (Kourtidis et al., 2011), and corporate reputation (Walsh & Beatty, 2007; Walsh et al., 2009) and CSR belief from ((Ortas et al., 2015) accordingly. The cross-sectional data was collected from multiple respondents who remain engage in stock purchasing and selling at Pakistan Stock Exchange. The convenient sampling technique has been used to determine the sample size. A total 450 questionnaire were distributed among targeted respondents and final sample size range up to 386. The response rate remains 85.777. The study used structural equation modeling (SEM) to determine normality, correlation, regression and confirmatory factor analysis of explanatory variable and dependent variable with incorporated mediating factors of corporate reputation and CSR belief.

*Theoretical Framework**Figure 1: Conceptual Model*

The framework outline the way how variable are being incorporated and empirically tested to determine the statistical relationship.

**Results***Measurement Models*

Structural equation modeling contained two segments; in which the measurement model used to evaluate fitness of observed factors on its latent variable. There are numerous measures for the goodness and the fitness of the measurement model, whereas in this study, the main emphasis is to examine fitness through Chi-square, normed Chi-square, GFI, NFI, GFI, RMR and RMSEA. The Chi-square values are assumed to be the lowest for the fitness of the model, while the normed chi-square values must be less than 5 (Lomax &Schumacker, 2004). The values of GFI, CFI and NFI must be higher than 0.90 for model goodness (Tabchnick&Fidell, 2006; Shevlin& Miles, 1998). The values RMR and RMSEA are assumed, respectively, lower than 0.08 and 0.10 (Steiger, 2000; Browne &Cudeck, 1989). The results of the measurement model have shown that the values of Chi-square, normed Chi-square, GFI, NFI, GFI, RMR and RMSEA are between defined ranges that have demonstrated goodness and fitness.

*Table I: Comparative Fitness levels of Measurement Model*

Index	Cut Off Level	CEE	TB	CR	CSR
		Fitness	Fitness	Fitness	Fitness
$\chi^2$	Low preferred	28.40	18.50	10.60	22.96
$\chi^2/df$	$\leq 5.0$	3.55	5.00	5.00	5.01

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RMR	≤ .08	0.03	0.05	0.03	0.03
CFI	≥ .90	0.94	0.99	0.97	0.93
GFI	≥ .90	0.98	0.99	0.96	0.98
NFI	≥ .90	0.92	0.99	0.96	0.92
RMSEA	≤ .10	0.08	0.10	0.10	0.09

#### *Descriptive Statistics and Normality*

Descriptive statistics is used to measure normality through the minimum, maximum, mean, standard deviation, skewness, kurtosis and Jarquebera. There are multiple ways and in this study the mean and standard deviations are explained while other measures are verified before the final analysis. There are a total of 386 questionnaires included in the data analysis and the values of standard deviation are aligned with the mean. The reliability analysis carried out to examine the reliability of the data and the values are between defined ranges of 0.7 to 0.9. This means that the sample data is completely reliable and suitable for regression analysis.

*Table 1: Descriptive Statistics and Correlation*

	Mean	SD	1	2	3	4
CEE	3.823	0.590	1.000			
TB	3.702	0.680	.276**	1.000		
CR	3.771	0.657	.479**	.414**	1.000	
CSR	3.843	0.529	.337**	.388**	.467**	1.000

There are some other normality tests such as P-P Plot and Histogram also considered for further verification regarding the normality of the data. All statistical measures indicated that the sample data are normal. In addition, the correlation matrix is verified to analyze the relationship between dependent, independent and mediating variables. The corporate environmental ethics has demonstrated a significant and positive relationship with trading behavior, corporate reputation and corporate social responsibility. In addition, there is a noticeable correlation between corporate reputation and corporate social responsibility.

#### *Hypothesis Testing*

The structural equation modeling applied for confirmatory factory analysis and then the structural model was performed to examine the direct relationships. In direct relationships, it is examined that corporate

environmental ethics contributed significantly to the trading behavior of investors. The standardized estimates have shown a coefficient value of 0.403 with a significant probability and a critical ratio. It has been examined previously and theoretically supported that, with the increase of awareness of environmental ethics, it will directly influence trading behavior. In the remaining direct relationships, corporate environmental ethics contributed significantly to corporate reputation and corporate social responsibility beliefs. The standardized estimates have shown 0.738 and 0.603 respectively for corporate reputation and corporate social responsibility.

Table III: Standardized Regression Weight

			Std. Estimates	S.E	C.R	P-Value
CEE	→	TB	0.403	0.148	2.299	0.022*
CEE	→	CR	0.738	0.128	7.540	0.000**
CEE	→	CSR	0.603	0.090	5.947	0.000**
CR	→	TB	0.461	0.103	3.875	0.000**
CSRB	→	TB	0.740	0.566	4.281	0.000**

\* $p < 0.05$ , \*\* $p < 0.01$

In addition, corporate reputation and corporate social responsibility beliefs contributed to the investor's trading behavior with a coefficient of 0.461 and 0.740, respectively. Iacobucci et al. (2007) showed that SEM could be a more comprehensive model to explore relationships in mediation and moderation. Baron and Kenny (1986) proposed to examine the direct relationship and then mediation could be tested. They suggested four steps of mediation analysis. In addition, the Sobel test applied for the confirmation of the mediation (Sobel, 1982), which confirmed that the corporate reputation is mediating significantly between the relations of corporate environmental ethics and trading behavior.



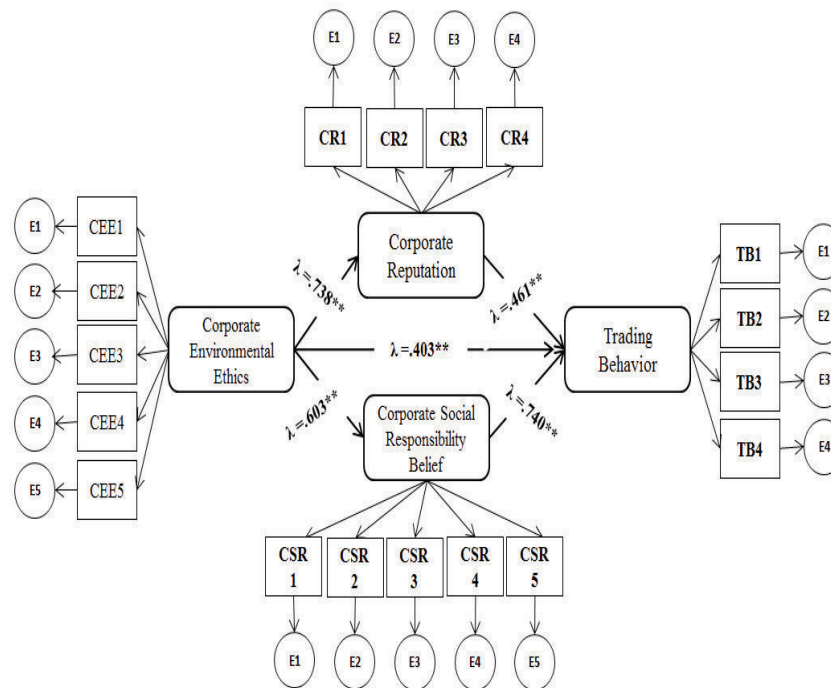


Figure II: Structural Model

In addition, corporate social responsibility beliefs also mediated between the relationships of corporate environmental ethics and trading behavior. The values of CFI, GFI and RMR are among the desired ranges that clearly demonstrate the goodness and fitness of the model. In addition, the Sobel test (Sobel, 1982) is incorporated to verify, which clearly demonstrated that there is a partial mediation among aforementioned relationships.

### Conclusion & Discussion

The result of the study suggests that corporate environmental ethics positively and significantly associated with perceived corporate reputation and CSR belief. The statistical analysis also indicates that corporate environmental ethics significantly impacts individual trading behavior. According to SEM analyses the mediation role of corporate reputation and CSR believe also remain significant with respect to the significant causal association between corporate environmental ethics and trading behavior.

The findings of the study advocate that organization should pay more attention to corporate environmental ethics because it is prudent to determine the level of corporate reputation and trading behavior of individual investor. Extending this notion if organization's which remains concern about their reputation should invest more resources to enrich corporate environmental ethics. The statistical analysis of the study also examines the mediation effect of perceived corporate reputation and CSR belief. Perceived corporate reputation plays a mediation role with respect to the significant causal association between corporate environmental ethics and trading behavior. The significant mediating effect of perceived corporate reputation adhere to the notion that corporate environmental ethics is a prudent precursor of corporate reputation which in turn positively affect the perception of individual investor in the context of Pakistan. The perceived corporate reputation remains valuable intangible asset for organization.

The results of study remains align with past studies (Cai et al., 2016; Chang, 2011; Jo et al., 2015). Similarly, the direct and mediating effect of CSR belief remain positively significant. The investors who remain socially concern pay attention to the corporate environmental activities of the organizations. Accordingly the statistical results of the study suggest that stakeholder with CSR belief remain attentive towards socially responsible initiatives and measures taken by organizations. Past studies however, largely proclaim that investor mainly remains concern about financial outcome and firm's main responsibility according to classical theories remains only wealth maximization (Amann et al., 2007; Ortas et al., 2015).

In past investing in environmental activities was considered unnecessary and main liability of the organizations remain to increase the wealth of shareholders. However, now a day's stakeholder demands that companies should meet economic, social and discretionary responsibilities. Environmental consciousness of stakeholder enables the organizations to redesign existing products and processes which remain align with environmental regulations (Ortas et al., 2015; Reverte et al., 2016).

The integration of social concern not only remains vital to meet regulatory pressure but also remain crucial for sustainable economic growth. Therefore, in the light of empirical findings it is suggested that companies listed on Pakistan stock exchange should allocate more resources to environmental activities. The outcome will not only build the image and reputation of the organizations as a social entity but also reduce the cost of economic contract with stakeholder.

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