

Role of Green Supply Chain Practices in Improving Firm's Sustainability and Performance

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Abstract

This paper aimed to investigate the impact of organizational pressure and environmental consciousness on businesses' adoption of Green Supply Chain Practices (GSCPs). GSC management (GSCM) should be incorporated into an organization's strategic approach to achieve significant performance enhancement. The target companies for this project were Pakistan's leading textile, garment, and apparel manufacturers and exporters. The influence of variables such as Knowledge Management Orientation (KMO), Strategic Orientation (SO), Market Orientation (MO), and Green Entrepreneurial Orientation (GEO) was investigated. A comprehensive and inclusive survey instrument based on the Likert Scale was used to collect data. 261 employees from 261 textile companies participated. The data were analyzed, and hypotheses were tested using the structural equation model (SEM) method and the SMART PLS software, which permitted the development and testing of a complex and interactive conceptual framework. The results will be beneficial for business managers and policymakers. This study demonstrates that institutional pressure has a more significant impact than environmental awareness in encouraging businesses to implement sustainable supply chain strategies. The economy's recovery would be significantly dependent on the effectiveness of the governing bodies. In addition to dynamic capabilities and strategy renewal funded by government capital assistance, critical and sustaining factors for SME performance include dynamic capabilities. The research also revealed that the conventional pressure exerted by distribution network partners and consumers had the most significant impact among the various business pressures, followed by simulated pressure.

Keywords

Green Supply Chain Management (GSCM), Knowledge Management Orientation (KMO), Strategic Orientation (SO), Market Orientation (MO), and Green Entrepreneurial Orientation (GEO).

1. Introduction

One of the fastest-developing fields in theory and practice in today's academic and industrial landscape is the study of the Green Supply Chain (GSC). Companies need to reduce manufacturing and supply chain costs to achieve a

competitive advantage (Badar et al., 2013). As consumers and manufacturers become aware of environmental issues and climate change, an effective Sustainable or Green Supply Chain must satisfy consumers and maintain growth in company market shares and revenues (Al-Odeh et al., 2021). Gholami et al. (2023) have summarized a review of sustainable manufacturing. This paper discusses the current happenings in the area of GSC Management (GSCM) as well as highlighting some antecedents to GSCM. The knowledge management perspective obtains external and internal organizational knowledge, inspiring the Green Entrepreneurial Orientation (GEO) business to launch and enhance GSCM skills that boost sustainable performance.

Strategic orientation (SO) is a popular and growing business and management research topic. Strategic management companies may understand the real explanation of strategic vision that unwaveringly affects business performance. Over time, studies have discovered many primary directions that exhibit complicated consequences at the interaction stage. This study selected environmentally innovative, marketable products and information associated with the most elevated compelling capacity to embrace authoritative natural exercises and add to unrivaled firm execution. Because of rising worldwide natural mindfulness, green inventory network board (GSCM) rehearses became fundamental and one of the best sustainability avenues among professionals, specialists, NGOs, and enterprises.

Nevertheless, it's one of the first researches to discover GSCM's firm-level forebears like strategic direction. Until recently, extensive study has shown a relationship between strategic direction and corporate performance (Gast et al., 2017; Jiang et al., 2018). However, no explicit guidance exists on how SO enhances efficiency (Hughes et al., 2018). Furthermore, scholars say that instead of focusing on the direct impact of SO, it is necessary to investigate the practical procedure of SO with performance indicators (Hughes et al., 2018). Hereafter, our research looks at the aspects that influence SO, like using GSCM methods, which improve long-term organizational effectiveness (Habib et al., 2020). Furthermore, this work investigates how Market Orientation (MO) and Knowledge Management Orientation (KMO) affect GEO & GSCM procedures. The study seeks to investigate new aspects of how enterprises might satisfy the green demands of their stakeholders while also boosting sustainability goals.

With a significant detrimental effect, the textile sector's sustained growth is a major challenge considering the changing international trade climate. Producers try to embrace GSCM methods and enhance company performance (Huang and Li 2017, Zaim et al. 2018). This research focuses on the Pakistani garment and textile sector, a critical sector in socio-economic status. Pakistan's textile sector is a suitable case study for scientific data as it is one of the world's largest suppliers of garment and textile products, 8th largest exporter of textile products in Asia, provides employment to 40% of the total labor force, and generates 8.5 % of the national GDP (BOI, 2023).

1.1 Aim of the study

Strategic elements of Green Supply Chain Management (GSCM) include but are not limited to Knowledge Management Orientation (KMO), Green Supply Chain Practices (GSCPs), Strategic Orientation (SO), Green Entrepreneurial Orientation (GEO), and Market Orientation (MO); these are being studied in this causal research.

The present study's objective is founded on two concepts: institutional concept and resource-based evaluation. The first hypothesis addresses organizational forces to adopt ecologically friendly activities. According to this concept, three variables influence environmental creation: coercive stress, normative stress, and mimetic power. The outward pressure on consumers, providers, or other comparable factors exerts normative stress. The formal hypothesis states that strains that cause changes impact organizations. Considering Green Supply Chain management to understand how the company might design implementation strategies to achieve success—creating a performance-based plan while maintaining the client's grip and the government's rules are necessary. According to resource-based evaluation, unique resources can boost a company's performance and competitive advantage. According to the resource-based view (RBV) theory, a company's SMART goals come from its limited, distinctive, and valuable resources, making it hard for competitors to substitute. Since GSCM activities require organizing abilities, the RBV notion may demonstrate how they might extemporize collaboration.

1.2 Case study

The apparel and textile industry are becoming ever more invigorated due to the systems of GSCM and Sustainable practices. Organizations must identify and address issues that threaten sustainable efficiency. Thus, strategic corporate placement is the best way to use Green Supply Chain Management (GSCM) to achieve sustainability goals. The findings help textile sector organizations adopt GSCM ideas and adjust their structures to survive in a more ecologically responsible business climate. It is one of the first studies to evaluate how a strategic viewpoint affects the

deployment of GSCM approaches in the textile industry from the perspective of an upstream operation with a deep understanding of the components and a low ecological footprint. Political pressure, corporate ideology, green knowledge, financial and technical capabilities, and social and economic advantages from green applications could all be factors in introducing GSCM throughout the Pakistani textile industry. Additionally, some businesses have accepted OEKO-TEX, ISO9000, WRAP, ISO14001, BSCI, LEED, and SEDEX accreditation, yet many are underperforming in GSCM implementation.

1.3 Study Contributions

Most firms throughout the Middle-East Gulf nations, particularly Saudi Arabia, aiming to avoid fines issued by state administration or corporate bodies for environmental violations to avoid economic damage. As previously indicated, this prepares such institutions and decision-makers to embrace GSCM methods, which can assist in protecting such businesses from such unwelcome losses. Environmental and organizational concerns can convince organizations to implement Green Supply Chain policies, with the latter having a more significant influence. Standard stress from distribution network clients and partners is the most critical institutional constraint, followed by faking pressure and force-consuming force. Environmental issues have grown internationally, requiring legislators and ecological regulators to use organizational pressure on companies to satisfy the requirements of ecologically responsible operations.

Moreover, it is critical to actively depend on internal motivation and a strategic concentration on environmental protection from top to bottom to implement GSCM principles. Managers and planners must focus on the strategic ecological direction while maintaining open lines of communication with partners about GSCM aims and possibilities to reap their most significant advantages. Ultimately, this research revealed that these activities might increase business performance, motivating investors and decision-makers to adopt these techniques.

2. Literature Review and Hypotheses Development

2.1 Green Entrepreneurial Orientation (GEO) and Green Supply Chain Management Practices

Considering the dynamic capability, the best commercial options are easily identifiable using the GEO sensing abilities. They use eco-friendly methods to meet the difficulties of future environmentally-conscious customers and other stakeholders (Habib et al. 2020). Business organizations may benefit from GEO-grabbing capabilities by mobilizing resources to adopt green technology and manufacturing, which increases output efficiency, decreases power consumption, and lessens environmental damage (Jiang et al. 2018). Businesses are being pushed to adopt green practices due to the increasing unpredictability of global environments. The market potential is the backbone of GEO's vision (Teece 2007). Suppose a GEO business takes advantage of a single green practice, such as selling surplus stock, scrap, and used materials (Zhu et al., 2005), harvesting rainwater, reusing wastewater, recycling, and using energy-efficient and solar-powered lighting. In that case, the business may see an increase in its financial and environmental performance (Huang and Li, 2017). To safeguard its reputation, the GEO company uses internal ecological management techniques, including ISO 14000, EMS, regulatory impacts, and program monitoring (Zhu et al. 2013). Businesses must implement green measures in uncertain environments where GEO-altering capacity is possible. As a result of GEO's business philosophy, conventional practices are giving way to environmentally friendly ones (Teece 2016).

Hypothesis H1 (a): Green Entrepreneurial Orientation (GEO) has a significant impact on Green Supply Chain Management Practices (GSCMP).

2.2 Market Orientation (MO) and Green Supply Chain Management Practices

According to previous research, market focus has been shown to increase the effectiveness of GSCM and other environmental training methods (Choi, 2014; Green et al., 2015). Given the growing public concern about the environment, consumers have come to demand eco-friendly products. Companies in MO have responded to customer demand for environmentally friendly goods by adopting GSCM practices at a rapid rate (Green et al., 2015). Research shows that focusing on the market may significantly boost a company's innovation ability (Agarwal et al., 2003). It was also shown that innovation moderates corporate entrepreneurship and business success (Matear et al., 2002). MO's push for innovation to better the environment makes sense. A successful MO company emphasizes the needs and wants of its customers, conducts competitive analysis, and builds internal capabilities (like GSCM) to meet those needs (Frambach et al., 2003). According to (Rehman and Shrivastava (2011), consumer demand significantly affects whether or not businesses adopt and implement environmentally friendly procedures. Due to rising consumer demand

for eco-friendly goods and services, many manufacturers are implementing Supply Chain Management techniques (Urban and Govender 2012). MO is an intangible asset that adapts to market demand and leverages firm resources to create green products and GSCM, according to comparative advantage.

Hypothesis H1 (b): Market orientation (MO) significantly affects Green Supply Chain management practices.

2.3 Knowledge Management Orientation (KMO) and GSCM Practices

The firm is integrated with a separate business function that requires information and understanding to make a tactical decision and action plan. As a result, KMO is critical to establish a resource for acquiring, creating, transferring, and sharing knowledge and info activities inside the business (Attia and Salama, 2018; Attia and Essam Eldin, 2018). A prior inquiry discovered two types of data to be separate and distinct. As information can be easily copied, saved, and distributed, technologically-oriented knowledge management is one viable alternative. Human capital, which consists of knowledge, is similarly challenging to duplicate, preserve, and disseminate. According to Bolisani and Bratianu (2017), HR professionals' knowledge and skills are highly sought by companies of all sizes. In conclusion, how the organization adopts GSCM will depend on the priority and level of knowledge that upper and middle management places on it. This led to the study's hypothesis: the field generally benefits from KMO's advocacy for GSCM approaches.

Hypothesis H1(c): Knowledge Management Orientation (KMO) significantly affects GSCM practices.

2.4 GSCM Practices (GSCMP) and Operational Performance (OP)

Advanced countries are taking several steps to revitalize the industrial sector (Barney, 1991). To enhance SC management, it is vital to monitor performance to control operations and tasks (Niinimäki et al., 2020). It is also a requirement for advancement. It enables the existing system to operate more efficiently than others (Nelson 1991). At the same time, Powell (2001) argues that without adequate measures for monitoring supplier performance, customer happiness would suffer, resulting in missed chances to enhance SC performance. This study proposes the following hypothesis.

Hypothesis H2 (a): GSCM practices significantly affect Operational Performance (OP).

2.5 GSCM Practices (GSCMP) and Economical Performance (ECP)

The operations included in GSCM boost economic performance by decreasing the price of obtained resources, decreasing energy consumption, and decreasing the price of treatment and disposal of waste (Zhu et al., 2007). A significant issue with GSCM methods is that they immediately have no noticeable impact on economic performance. The fact that GSCM methods have no direct effect on economic performance is disputed. For instance, it was argued (Bowen et al., 2006) that the GSCM strategy did not lead to immediate gains in sales and profit. In addition, studies have shown that companies' spending goes up when they try to be more environmentally conscious, which might have a negative effect on their bottom line (Min and Galle, 2001). But there are several ways in which GSCM methods boost economic success. By first reducing production costs and energy and waste expenses, the GSCM approach enhances financial prospects. As a second benefit, GSCM practices help strengthen the company's brand and cultivate client loyalty, boosting the company's long-term financial performance. The research suggests the following hypothesis in light of the discussion above.

Hypothesis H2 (b): GSCM Practices (GSCMP) significantly impact Economical Performance (ECP).

2.6 GSCM Practices (GSCMP) and Environmental Performance (EVP)

Reducing the use of potable water, electrical power, hazardous and toxic chemicals, waste produced during production, effluent discharge, and air pollution are all ways GSCM strategies boost environmental performance (Eltayeb et al., 2011; Green et al., 2015). The environmental impacts of a product during its lifespan can be reduced by using eco-design techniques, which improve product functionality while decreasing energy consumption and waste treatment costs (Zhu et al., 2005). Indicators or performance metrics should be created and then reviewed to track organizations' efforts in their different operations to achieve a green economy (Lin et al., 2019). Following hypothesis is proposed.

Hypothesis H2(c): GSCM Practices (GSCMP) significantly affect Environmental Performance (EVP).

2.7 Research Framework

Many scholars have proposed various approaches for investigating and evaluating the link between environmental performance and employee retention. The research found in the literature revealed both positive and negative connections between firms' sustainability programs and their economic, functional, and ecological success (Kraaijenbrink et al., 2010; Bolisani and Bratianu, 2017; Faisal et al., 2018). Figure 1 shows the research framework for this study.

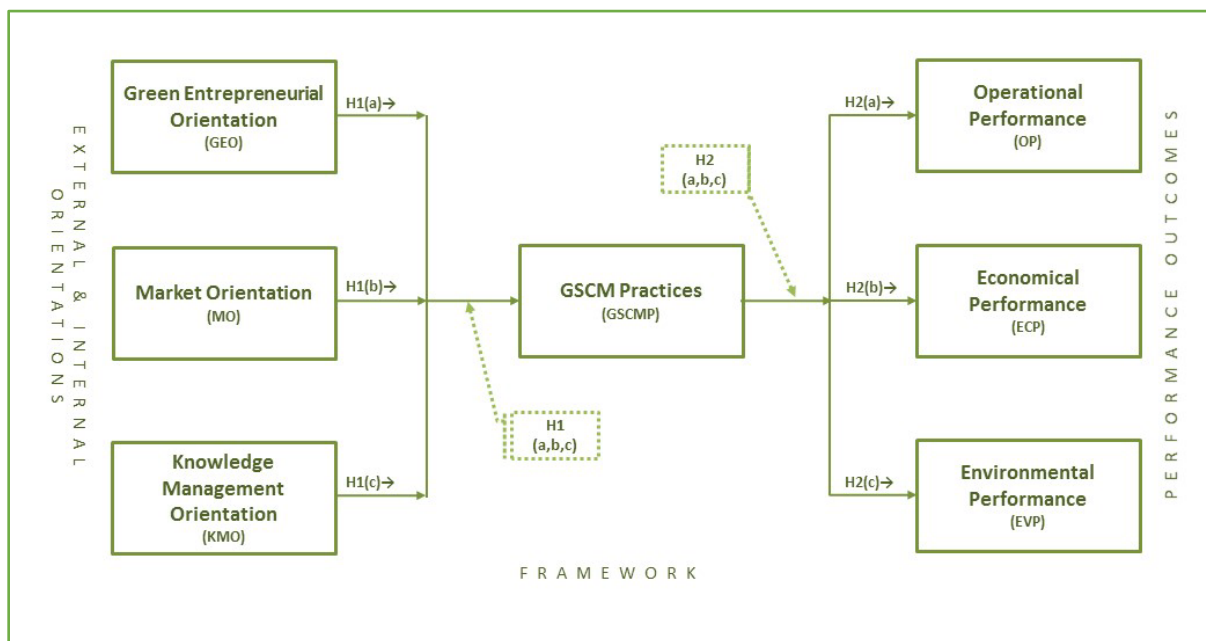


Figure 1. Research framework

3. Research Methodology

3.1 Statistics and Measurements

This research's sample size is from the textile manufacturing industry in an emerging economy, Pakistan. This emerging economy has grown trade to 120 million USD. After the pandemic, its textile industry appeared as Asia's leading textile industry - the 8th largest textile products exporter, 4th largest producer, and 3rd largest consumer of cotton (BOI, 2023). The textiles industry, which supplies everything from denim jeans to towels for buyers in the US and Europe, is one of the country's few economic bright spots.

Textiles contribute to around 60% of the emerging economy's overall exports, and when the epidemic first arose in 2020, Pakistan permitted its facilities to reopen earlier than India and Bangladesh, drawing orders from global brands, including Target Corp. The emerging economy is presently a growing Asian economic player. The country has 442 yarn industries, 423 cloth factories, and 423 textile industries (BOI, 2023). This study's sample consisted of actively working owners and supervisors of textile manufacturing firms. A random sample approach is used in this study because it gives all responders an equal opportunity. This work gathered information from 261 participants from 261

textile industries. Table 1 demonstrates that most participants in this study are knowledgeable and work in various divisions of the textile industry.

Table 1. Demographic profile of the sample

Work Position	N	%
Asst. manager/manager	29	11%
GM/senior manager	13	5%
MD/Director/CEO	4	2%
Other	215	82%
Grand Total	261	100%
Academies	N	%
Doctorate	9	3%
Graduate	37	14%
Postgraduate	15	6%
Undergraduate	192	74%
Other	8	3%
Grand Total	261	100%
Industry Type	N	%
Apparels	15	6%
Textile & Garments	53	20%
Other	193	74%
Grand Total	261	100%

3.2 Data Collection Method

We gathered information using a questionnaire survey method which is an approach in primary research projects, by creating questions for data collecting and then analyzing them via tools to discover the inference link among the elements. A 5-point Likert scale was utilized for the survey to offer the responder a degree of intensity and sentiment stated without misunderstanding. The measurement elements for all build sizes range from 1—"strongly approve" to 5—"strongly disapprove." Dimensions: two items (Kraaijenbrink et al., 2010) were used to assess green entrepreneurial inclination. Three market-oriented elements were chosen (El-Garaihy et al., 2022). Four KMO pieces were taken from (Kraaijenbrink et al. 2010). Internal environmental management, Eco-design, customer collaboration, etc. were four elements of GSCM processes (Min and Galle 2001). The survey also assessed responsible company performance factors, namely ecological and economical. Table 2 contains data on variables and measuring objects.

Table 2. Items, Loadings, Credibility

CONST.	ITEMS	ANALYSIS OF PRODUCTIVE ITEMS	Loadings	CronBa	CR
Green Entrepreneurial	GEO1	In an unpredictable world, our company takes a proactive approach to embrace demonstrable ecological prospects.	0.732	0.618	0.708
	GEO2	Our company usually conducts an initiative in response to a rival's moves.	0.826		
Market Orientation	MO1	Our firm collects the customer's wants and needs better than our competitors	0.739	0.891	0.747
	MO2	We regularly and systematically collect our customers' information.	0.764		
	MO3	Our company improves technology using customer data.	0.819		
Knowledge Management	KMO1	We have clear rules for categorizing product knowledge.	0.743	0.618	0.777
	KMO2	We have clear rules for categorizing process knowledge.	0.861		
	KMO3	Our employees always collaborate using technology.	0.704		
	KMO4	The organization has the opportunity to connect with its customers as well as with other sectors.	0.771		

GSCM Practices	GSCM1	Sustainable Procurement techniques improve economic efficiency by lowering costs and increasing energy utilization.	0.843		
	GSCM2	Green Supply Chain Management reduces costs and improves energy use, enhancing economic performance.	0.737	0.642	0.787
	GSCM3	Green Supply Chain decreases fines for environmental accidents.	0.725		
	GSCM4	Does a Green Supply Chain help in improving a firm's Sustainability?	0.765		
Economic Performance	ECP1	In contrast to the previous three years, the cost of energy use has recently fallen.	0.768		
	ECP2	ROI has risen during the past three years.	0.843		
	ECP3	Net profit has increased during the previous three years.	0.851	0.661	0.797
	ECP4	Our company's efficiency gains have increased due to reduction, and our performance has improved.	0.729		
Environmental Performance	EVP1	Our company closely adheres to new products to decrease fabric usage.	0.796		
	EVP2	Our company has maintained product development in addition to storing, repairing, and reclaiming equipment and pieces.	0.867	0.606	0.792
	EVP3	Our company keeps a brand strategy to prevent or limit the usage of dangerous materials and production processes.	0.774		
Operational Performance	OP	Green supply chain practices significantly impact service quality.	0.741		
	OP	A sustainable firm has a good influence on service quality.	0.822	0.541	0.764
	OP	GSC methods could be effective in achieving the desired operational performance levels.	0.852		

3.3 Data Analysis Procedure

PLS-SEM was utilized in this investigation because it is widely used in humanities, advertising, MIS, and the company's strategic work (Hult et al., 2018). To strengthen the theory with empirical data, the PLS correlational approach was utilized as a well-acknowledged model (Hair et al., 2016). We use Smart PLS software to evaluate the data. PLS is a valuable tool for GSCM study because of its great flexibility in the interaction between data collection and data analysis (Vanalle et al., 2017).

3.4 Measurement Model

The research focuses on how significant the model is, how consistent it is internally, and how we may quantify it. We began our reliability analysis by examining the system's Composite Reliability and Cronbach's alpha. Cronbach's alpha (CA) values varied from 0.541 to 0.891, while the Composite Reliability (CR) of the first-order components examined in this study was between 0.708 and 0.797. The CR value exceeds the minimum of 0.7, showing that the model used to measure our construct is reliable (see Table 2). The components are separate. The Fornell-Larcker criteria, bridge, and HTMT assessed discriminant validity. The diagonal elements' square root exceeds the fact association's light in the many rows, meeting the Fornell-Larcker Criterion (as seen in Table 3).

Table 3. Qualitative, correlational, and discriminatory accuracy of variables

	EVP	ECP	GEO	GSCM practices	KMO	MO	OP
EVP	0.749						
ECP	0.632	0.704					
GEO	0.515	0.526	0.741				
GSCM P	0.603	0.628	0.468	0.694			
KMO	0.613	0.622	0.479	0.684	0.682		
MO	0.577	0.583	0.575	0.614	0.648	0.704	
OP	0.564	0.452	0.349	0.516	0.47	0.46	0.721

If the loading of the latent variable of the measured variables onto the associated construct is bigger than the loadings of all other constructs, then the cross-loading test is significant. Results from our cross-loading matrix indicate that all

Table 4. Building structures' unit cross-loading grid

			EVP	ECP	GEO	GSCM P	KMO	MO	OP
Economic Performance (ECP)	ECP1		0.468	0.747	0.362	0.437	0.502	0.476	0.329
	ECP2		0.430	0.668	0.309	0.393	0.408	0.340	0.233
	ECP3		0.451	0.715	0.372	0.494	0.435	0.400	0.392
	ECP4		0.429	0.684	0.436	0.433	0.403	0.419	0.302
Environmental Performance (EVP)	EVP1		0.796	0.475	0.414	0.489	0.456	0.434	0.461
	EVP2		0.670	0.461	0.384	0.393	0.469	0.374	0.386
	EVP3		0.774	0.486	0.362	0.467	0.460	0.484	0.417
Geographical Orientation (GEO)	GEO1		0.432	0.428	0.781	0.369	0.385	0.492	0.256
	GEO2		0.326	0.348	0.699	0.323	0.322	0.353	0.263
GSCM Practices (GSCM P)	GSCM1		0.430	0.484	0.280	0.712	0.414	0.385	0.400
	GSCM2		0.337	0.425	0.354	0.634	0.545	0.490	0.338
	GSCM3		0.525	0.418	0.337	0.689	0.515	0.435	0.346
	GSCM4		0.365	0.408	0.325	0.737	0.414	0.387	0.344
Knowledge Management Orientation (KMO)	KMO1		0.430	0.453	0.347	0.485	0.679	0.451	0.291
	KMO2		0.461	0.422	0.354	0.496	0.673	0.449	0.299
	KMO3		0.404	0.444	0.296	0.434	0.663	0.407	0.383
	KMO4		0.371	0.375	0.304	0.445	0.714	0.458	0.318
Market Orientation (MO)	MO1		0.439	0.415	0.311	0.410	0.435	0.707	0.355
	MO2		0.364	0.383	0.423	0.446	0.451	0.680	0.282
	MO3		0.419	0.432	0.474	0.438	0.481	0.725	0.335
Operational Performance (OP)	OP1		0.441	0.375	0.285	0.384	0.341	0.303	0.739
	OP2		0.422	0.303	0.302	0.415	0.393	0.347	0.764
	OP3		0.352	0.303	0.148	0.306	0.272	0.352	0.656

measurement items are more effectively loaded on their intended structure (see Table 4). The Fornell-Larcker Criterion, and cross-loading grid, all yield identical findings, proving discriminant validity. The diagonal data is the square root of the construct's average variance extracted (AVE). The horizontal data represents the construct's average variance (AVE) square root. Note: Outer loading of the measurement items on the associated construct (green background) is more significant than all other constructs' loadings.

4. Results

To investigate the relationships between construct variables, a framework is built (like the fictitious Model) that is consistent with the goals of the investigation. We used a two-pronged strategy to examine the hypothesis, looking at the significance of the path coefficient using a bootstrapping sample size of 5000. We then looked at how MO and KMO mediate among GEO & GSCM activities and how GSCM practices affect firm performance. The predictive power of the hierarchical model was calculated using the R square value. The predictive value was established because the structural model accounted for 32.1% of the variation in environmental performance and 27.5% of the variability in economic performance.

Table 5. Bootstrapping results for structural model evaluation.

Hypothesis	Path	Path Coefficient	T Statistics	p Values	Decision
H1(a)	GEO -> GSCM practices	0.096	1.607	0.109	Not supported
H2(c)	GSCM practices -> EVP	0.603	9.987	0.000	Supported
H2(b)	GSCM practices -> ECP	0.628	10.750	0.000	Supported
H2(a)	GSCM practices -> OP	0.516	6.760	0.000	Supported
H1(c)	KMO -> GSCM practices	0.476	7.846	0.000	Supported
H1(b)	MO -> GSCM practices	0.250	3.869	0.000	Supported

A path coefficient (b) & t-statistics were used to analyze the correlation between the study's dependent variables. See Table 5. Green supply chain management (GSCM) techniques, key performance indicators and GEO were all adversely connected. Therefore, H1(a) could not be supported. A positive correlation may be seen between GSCM practices and EVP and other environmental performance indicators ($t = 9.987$, $p < 0.05$). Therefore, H2(c) was accepted. As a result, GSCMP and EVP competency in the workplace will become increasingly intertwined with GSCM practices at companies having the former. All hypotheses concerning the positive correlation between GSCM-Practices and ECP [H2(b)], OP [H2(a)]; KMO and GSCMP [H1(c)], as well as MO and GSCM-Practices [H1(b)], have had a larger t-statistic and a lower p-value and were thus accepted. Except for the correlation between industry type and environmental performance, which was significant ($p < 0.05$), all other sources of variations were determined to be statistically insignificant. This is because different industries create different levels of pollution and have different effects on the surrounding environment.

Because of the dynamic and inventive character of GSCM, this work offers up several avenues for future research. For example, a study that gathered cross-sectional information can be used in the additional investigation to control the panorama of variations that react to the regulations. Parallel examination, on the other hand, can give future insight into the ideas for GSCM performance that were not explored owing to time constraints. A future longitudinal study may also indicate how organizational transformation, the status of the economy, corporate structure, leading advantage, and stakeholder demand impacts managers' attitude about these behaviors. Finally, imagine international corporations coping with various rules and network configurations. In that situation, researchers must investigate many geographic issues associated with sustainability practices in these organizations to acquire a comprehensive perspective on the relationship between nature conservation inspirations and supply network performance. Aside from the initial, future comparative analysis of green procurement observations for organizations from other regions might generate significant suggestions where green procurement practices differ according to each region's ideology, economic situation, and methodologies.

5. Discussion and Implications

To compare our study with others in the middle east, it was seen that most businesses in the Middle-East Gulf region, particularly Saudi Arabia, want to avoid the permissions issued by authorities for profitable facilities due to environmental infractions to prevent financial losses. According to Vanalle et al. (2017), this motivates innovators and arbiters to embrace GSCM strategies that can potentially prevent such devastating financial losses for their respective organizations. The results of our study showed that the change implementation process is more influential than environmental concerns and acknowledged pressures in getting firms to embrace sustainable supply chain practices. Study results show that the most influential type of stress is the everyday stress from suppliers' coworkers, and clients, followed by duplicated stress and imposed ranking stress. Global environmental distress has increased, necessitating legislative and environmental expert institutional pressure on businesses to ensure they meet the standards of environmentally helpful activities (Ahmed et al., 2018). Also, strong GSCM policies can't be effectively implemented if people rely solely on their intrinsic motivation and tactical attention to environmental protection through crucial duties. To obtain better GSCM operations and reap the most significant rewards, strategists and managers must focus on a strategic environmental orientation while keeping excellent communication with stakeholders regarding goals and possibilities (Kirchoff et al. 2016). This study's findings that these actions may improve corporate performance provide a rationale for consumers and policymakers to embrace them.

5.1 Theoretical and Practical Implications

Considering the discussion above, the study has real-world implications for decision-makers and institutions. Manufacturers who might benefit economically from implementing green supply chain strategies must address these unfounded allegations and their practical ramifications. Policymakers in different organizations must be aware of the physical connections between the internal and external elements that affect the implementation of these policies. In contrast, policymakers must monitor the company's activities for improved technological and social advancement. Public officials and regulators can utilize this study's findings to inform their efforts to encourage company executives and manufacturers to adopt green supply chain practices. These studies confirmed the normative and mimetic capacities of institutional pressure. The group viewed them as crucial guidelines that shape how GSCM ideas are implemented in the real world. Government authorities, who can compel businesses to adopt more environmentally friendly practices, must also aim to promote the value of a green environment and try to raise awareness of its advantages among managers and producers.

5.2 Managerial Implications

According to the study's findings, managers were given insight into the key requirements for developing and executing efficient and valuable green supply chain strategies. Strategically assessing the value of organizational orientation is the responsibility of managers; a focus on the environment will help businesses better track the strategic approach to GSCM processes rather than only responding to them. Corporate strategy research may help managers improve productivity and profitability while also being good for the environment and the bottom line by capitalizing on competitive advantages. Practitioners in the manufacturing sector may better understand the dynamics at play between strategy execution and contextual factors to deploy better GSCM strategies that enhance the economic performance of firms while reducing their adverse effects on the environment. As a result of this research, business owners and managers will better understand how to implement GSCM practices with a focus on reliability, as well as how to transform their fundamental architecture, manufacturing, product chain, and mindset to achieve extraordinary, sustainable firm performance. Managers would benefit from GSCM because of its significant impact on a business's overall performance. In general, by adopting and advocating environmentally friendly approaches, managers may boost the productivity and efficiency of their organizations while also pursuing long-term economic gains.

6. Conclusion and Future Research Directions

The lack of extensive data gathering from supply chain focal businesses, which would have included many downstream and upstream stakeholders, was a study limitation. Consequences, both immediate and reverberating, were examined. Knowledge management systems were found to significantly impact SME entrepreneurial performance, as evidenced by a positive beta coefficient and statistically significant t-values and p-values. This research aimed to examine the potential of knowledge management strategies in boosting the competitiveness of small and medium-sized enterprises (SMEs) (knowledge-sharing behavior, inventive ability). To further understand the factors contributing to SMEs' enterprising and organizational success, the research looked at the roles of resources and competencies and the importance of recognizing opportunities.

The study's results confirmed the hypothesis that the researchers wanted to learn how ecological consciousness influences one's propensity to care about the environment. The CFA analyses' discriminant validity confirmed all hypothesized directions of causality among all components. Second, government agencies, competitors, and end-users are all influenced by institutional pressures (both strong and weak) that pull them toward greater GSCM performance. The study examined how GSCM techniques affected vital company performance indicators (environmental, operational, and economic). Because of the importance of the issues the study sought to explain and the findings it produced, it may be considered a landmark study in the context of Pakistan's current environmental situation. This research shows that institutional pressure is more influential than environmental consciousness in encouraging businesses to implement sustainable supply chain strategies. Recovery of the faltering economy would depend heavily on the efficiency of the governing bodies. Critical and sustaining factors for SME performance include dynamic capabilities and strategy renewal funded by government capital assistance. The study also indicated that the conventional pressure applied by distribution network partners and customers had the strongest influence among the different business pressures, followed by simulated pressure.

6.1 Limitations

The lack of extensive data gathering from supply chain focal businesses, which would have included many downstream and upstream stakeholders, was a study limitation. Consequences, both immediate and reverberating, were examined. Many problems plague this research. To begin with, the research was conducted on the textile sector in one country only. Since only one respondent was surveyed for each company, the results can only be extrapolated so far (e.g., top or middle management). Second, the research may benefit from acquiring more information from supply chain focus firms, such as multiple transmission and distribution parties. Third, both direct and indirect consequences should be considered.

6.2 Future Study Recommendations

Future research in the textile industry may focus on the mediator in the relationship between strategy implementation and GSCM, in addition to the mediator in the relationship between GSCM practices with long-term corporate success. An exciting research area could be how businesses might reorient their goals to take advantage of threats or disturbances (such as scarce fossil fuel supply) in a dynamic environment. The moderator in the relationship between GSCM practice and long-term company performance and the mediator in the relationship between long-term firm performance and a diverse group of stakeholders in manufacturing organizations might be the future research focus.

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