Analysis of the Influence of Green Supply Chain Management and Competitiveness on the Sustainable Performance

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ABSTRACT

Competition in the era of globalization is characterized by changes that are increasingly open, complex and competitive both in the internal and external environment of the company. These socioeconomic changes bring obstacles and challenges that must be overcome. Consequently, every company must develop its business strategy in order to compete. But in reality, many companies are unable to survive, so they must review their strategies and consider the concept of supply chain management. Today companies are faced with a global economy that affects prosperity but also has an impact on environmental degradation such as climate change, ozone layer depletion, biodiversity loss, pollution, degradation and depletion of air, water, minerals and soil. Green Supply Chain produces a competitive strategy for now so that business actors need to manage managerial activities with environmental issues. These issues become important for companies because stakeholders are required to address environmental and social sustainability in business operations. South Minahasa Regency is one of the districts that has abundant fishery resources and potential to be developed. This is supported by the vast sea and coastal areas. The production of fisheries sub-sector is very diverse, both in traditional and modern processing, but its management needs to consider various aspects, both economic, social and environmental aspects. The purpose of this study is to analyze the implementation of green supply chain management and competitiveness for sustainable performance in fisheries sub-sector businesses in South Minahasa Regency, North Sulawesi Province. The respondents of this study are business actors in the fisheries sub-sector using the Partial Least Squere (PLS) analysis. The results of the study are expected to contribute to sustainable business performance in the fisheries sub-sector.

1. Introduction

Changes in the Industrial era demand the role of companies in balancing managerial activities with environmental issues, so that organizations or businesses need to consider the activities carried out considering that nowadays most consumers are starting to realize the importance of sustainability issues for products and services produced. In response to consumer demands, the issue of sustainability has become a competitive advantage, as well as strict regulations and policies from the government, ultimately making businesses adopt more environmentally friendly practices. In addition, businesses that adopt green supply chain management will ultimately improve the company's reputation in the eyes of consumers and stakeholders. Environmental issues such as climate change, or weather can affect supply chains, so companies need to integrate sustainable practices into supply chain management can help reduce risk.

A supply chain management approach that adopts environmentally friendly practices will have an impact on increasing efficiency and reducing operational costs, which will have an impact on the company's operating performance. Sustainability performance refers to a company's ability to achieve

economic, environmental, and social goals by minimizing negative impacts on the environment and society. In short, supply chain management plays a critical role in determining the sustainability performance of a company. Effective sustainable supply chain practices not only provide benefits to the environment and society but also contribute to long-term economic success and business competitiveness. Companies that integrate sustainability into their supply chain management strategies will be better positioned to meet stakeholder expectations and address global challenges related to climate change and social responsibility.

Salah M. Diab, et al (2015) in The Impact of Green Supply Chain Management Practices on Organizational Performance: A Study of Jordanian Food Industries found GSCM has an impact or influence on organizational performance. Zhu et al (2005) GSCM as an influencing factor in achieving profitability, market share, minimizing environmental impacts and improving performance, in line with (Hilal, Fadel, 2023) also found GSCM has an influence on firm performance, but this study is different from research (Korosh et al 2018) GSCM has no effect on firm performance. Anandsingh Marwad and Seema Zagade (2020) suggest that GSCM is very important because it has an influence on customer satisfaction and economic performance. Amemba et.al (2013) GSCM leads to increased sustainability in the supply chain process and competitive advantage.

Kenny ROZ, Luqman Dzul Hilmi, R. Iqbal Robby and Chalimatuz SA'Diyah (2023) Green Supply Chain Management and Competitive Advantage: Evidence of Just-in-time Management on Firm Performance SMEs in Indonesia using a sample of 175 SMEs in Indonesia engaged in the manufacturing sector found that just-in-time systems, GSCM, and competitive advantage have a significant positive effect on the performance of SME companies in Indonesia both directly and indirectly. Novitasari, M and Agustina, D (2022) who examined Assessing the Impact of Green Supply Chain Management, Competitive Advantage and Firm Performance in PROPER Companies in Indonesia found that GSCM has a positive effect on competitive advantage, competitive advantage has a positive effect on company performance, but GSCM has no effect on company performance. Competitive advantage is able to mediate the relationship between GSCM and firm performance. The results of this study provide insight into the importance of implementing GSCM in order to create a competitive advantage and improve company performance in the midst of intense competition. Likewise, the results of research conducted by Astawa et al (2021) revealed that GSCM practices have a positive and significant effect on the performance and competitive advantage of five-star hotels. In addition, the results showed that competitive advantage functions as a mediator. The theoretical research finding is the existence of a relationship between variables, especially competitive advantage as a mediator variable, while from a practical point of view it shows that managers need to build competitive advantage to strengthen business performance.

South Minahasa Regency is one of the regencies that has abundant fishery resources and potential to be developed. The region is surrounded by the Sulawesi Sea, and the vast sea and coastal areas make South Minahasa Regency have abundant fishery resources. The production of fisheries subsector is very diverse, both in traditional and modern processing, but its management needs to consider various other aspects such as social and environmental aspects. The fisheries and marine industry, especially in the fisheries subsector, needs to be considered because it has the potential for economic growth. Fish resources have the potential as a source of world fisheries, but the production activities carried out have an impact on the amount of waste. GSCM is a new industrial innovation to reduce production waste that has an impact on environmental pollution. GSCM can also help improve the company's image in the market competition and improve performance and competitiveness. The results of this study are expected to be input for the fishing industry to consider green aspects in the implementation of supply chain management strategies..

2. Literature Review

2.1. Company Performance

Krause (2005) suggests that performance is understood as the degree of goal achievement or potential achievement of organizational characteristics that are important to the stakeholders involved. Therefore, performance is essentially determined by a multidimensional catalog of criteria. The source of performance is the actions of the actors in a business process. Grüning (2002) argues that performance is understood as the company's ability to achieve goals, that is, to meet expectations, and is therefore appropriate in a broad sense, but is also influenced by results through goal setting. It can

be concluded that performance involves an evaluation of how an organization functions and achieves business goals. Good business performance is often considered the key to long-term success and growth. Performance measurement helps organizations reflect on the results achieved. Performance measurement also helps organizations better understand the communities they serve to achieve optimal community satisfaction and influence the effectiveness of organizational goals.

2.2. Sustainable Company Performance

Sustainable corporate performance refers to an organization's ability to achieve its long-term goals while maintaining or improving the surrounding natural and social environment. It implies a balance between economic growth, social justice and preservation of the natural environment. Elkington, J., (1997) developed the three-pronged concept of economic prosperity, environmental quality and social justice. According to Elkington, the sustainability of the business world must pay attention to "3P" (Profit, People, Planet), specifically in addition to seeking profit (profit), the business world must also pay attention and participate in achieving the welfare of society (people), and actively contribute to environmental protection (planet). If economic performance is good, the company's ability to socialize its benefits to stakeholders increases. Nowadays, companies are required not only to achieve economic goals, but also to play an active role in environmental management and maintain the welfare of society.

The definition of sustainable performance may vary depending on the context, organization or goals to be achieved. But in general, sustainability refers to the ability of organizations or individuals to achieve their goals while considering the long-term impact on society, the environment and the economy. In a business context, sustainable performance often includes corporate social responsibility (CSR) and green business practices. Sustainable performance according to Henri & Journeault.-F., and Journeault, M. (2008) is the interaction between an organization's performance in its business, and performance (environmental, economic, social). Senge, P (2008) explains that Sustainable Performance involves continuous organizational learning and leads to adaptability to environmental, social and economic challenges.

According to Hart, S. L.; Milstein, M.B. (2003) experts in sustainable business, explaining sustainable corporate performance involves the pursuit of a sustainable economy by meeting social and environmental needs in the world. While Porter, M and Kramer, M (2011) in the article Creating Share Value, argue that sustainable corporate performance is the creation of significant economic value for the company with a positive contribution to society. Kaplan and Norton (1996) developed the concept of Balanced Scorecard, which is a framework for measuring organizational performance from multiple perspectives. They assume that sustainable performance is not only about profitability, but also about how the organization achieves long-term success by considering aspects of customers, internal processes, and learning and growth.

2.3. Environmental Performance

Environmental performance refers to how companies manage their environmental impacts, such as carbon emissions, natural resource use, and efforts to reduce waste. In Triple Bottom Line Elkington introduced the concept of the "Triple Bottom Line," which includes three dimensions of performance, namely economic, social, and environmental desirability. According to him, environmental performance is one of the three essential elements in assessing corporate well-being. Environmental performance" refers to the measurement and evaluation of the actions and results of an organization or entity regarding its impact on the environment. It involves assessing how well an organization manages its environmental responsibilities and commitments.

Environmental performance in business is not just about complying with regulations, but also about creating long-term value for the company and the environment. Businesses that perform well in environmental terms often benefit in terms of reputation, customer interest and wider stakeholders. In addition, sustainable practices can also reduce business risks related to climate change and strict environmental regulations. Indicators in environmental performance, Pollution Prevention, Resource Efficiency, Waste Management, Regulatory Compliance, Sustainable Supply Chain, Stakeholder Engagement, Continuous Improvement: The organization's commitment to continuous improvement in its environmental performance through setting and achieving environmental targets and goals.

2.4. Social Performance

Social performance is a term often used to measure the extent to which individuals or groups participate and interact in society or their social environment. Max Weber, explains how individuals act in a social context. For Weber, social performance is the action of individuals or groups that have certain goals, meanings and values in society. According to Emile Durkheim, a sociological figure, views social performance as individual integration within a larger social structure. He considered social performance as an indicator of social welfare and community stability. It can be concluded that social performance in business is not only about complying with regulations, but also about building a positive reputation, maintaining customer loyalty, and contributing to the long-term desires of the company. Companies that perform well in terms of social performance often gain long-term benefits in the form of a good image, strong relationships with society, and higher competitiveness. Social Performance Indicators are Employment and Working Conditions, Community Empowerment, Transparency and Consumer Engagement and Compliance and Certification.

2.5. Economic Performance

Economic performance including financial performance includes the measurement of the financial aspects of an entity, such as net profit, margin, cash flow and other financial ratios. In sustainability, it refers to how a business manages its financial resources, measures its financial performance and achieves its economic goals. It is an important aspect of business operations and includes a number of factors that affect the economic performance of a business. Strong economic performance is one of the key factors that help businesses grow and survive in a competitive business environment. For stakeholders such as shareholders, investors, and employees, good economic performance can also ensure that the company becomes a sustainable entity capable of providing added value in the long term. Economic Performance Indicators are Revenue and profit, Operational efficiency, Product and market development, External influences, Business strategy development and Financial planning.

2.6. Green Supply Chain Management

According to Srivastava, Samir (2007) Green Supply Chain Management (GSCM) is an integrated activity of environmentally friendly supply chain management to achieve sustainable goals. GSCM also involves efforts to integrate sustainable practices in supply chain management, such as environmentally friendly product planning, sustainable raw material procurement, energy efficient manufacturing, environmentally energy efficient transportation, and responsible waste management Craig R. Carter and Dale S. Rogers (2008). According to Seuring and Müller (2008): "Green Supply Chain Management is an approach that includes planning, implementing, and controlling the flow of materials and information from sources to consumers by considering environmental impacts and minimizing their negative effects." While Sarkis and Dhavale (2015): "Green Supply Chain Management is the integration of sustainable supply chain management practices in the planning, execution, control, and monitoring of material and information flows for the purpose of reducing negative environmental impacts and creating shared economic value. GSCM aims to achieve economic, social, and environmental desirability. It not only benefits nature, but can also help companies enhance brand image, save costs, and meet increasingly stringent environmental regulations. With the increasing awareness of environmental issues, GSCM is increasingly becoming a focus for many companies. According to Dheeraj, N. & Vishal, N. (2012). Green Supply Chain Management is an innovation in the implementation of supply chain strategies that are linked to environmental aspects through reduction activities or reducing production waste, recycle, reuse and material substitution. Hervani, et al (2015) suggested that GSCM is the practice of green Purchasing, Green Manufacturing/Materials Management, Green distribution/Marketing and reverse logistics. The above understanding reflects the basic concept of Green Supply Chain Management which includes the integration of sustainable practices in the entire supply chain to achieve economic efficiency while minimizing negative impacts on the natural environment. GSCM aims to create economic value along with environmental desirability.

Eco Design is how companies reduce the use of harmful materials or components and produce products that do not negatively impact the environment. Green Manufacturing is the company uses more efficient technology, uses materials and materials that are more environmentally friendly, reduces waste and pollution, and reduces waste. Green Distribution The company has standardized packaging and distribution of products in large quantities. Reverse Logistics is the Company manages the return of defective/damaged products or does not meet customer expectations, and pays attention to safe waste disposal and according to specified regulations.

2.7. Competitiveness

Everything the company has, both in the form of resources and activities within the organization can be used as a competitive advantage (Lestari et al., 2020). Efforts to gain competitive advantage through the ability to develop key competencies in order to serve customers better than competitors (Kuncoro & Suriani, 2017). Competitive advantage is related to the way companies choose and implement general strategies into practice (Herman et al., 2018). According to Porter (1990) defines competitiveness as "the ability or advantage used to compete in a particular market". This competitiveness is created through continuous development of all work in the organization, especially in the manufacturing sector.

According to Hamel, Gary & C.K Prahalad, (1994) In the book "Competing for the Future," argues that competitiveness is closely related to "the company's ability to create, market, and sell better goods and services." compared to competitors around the world. Factors that influence competitiveness according to, Metcalfe & R. Ramlogan & E. Uyarra, (2004) are efficiency. This factor is often overlooked due to weak education levels. Efficient use of resources will result in affecting efficiency. For example, paying attention to the quality of raw materials, processes and products, profits will then be achieved, willingness and ability to link profits with capacity growth, especially the willingness to invest. Small and medium-sized enterprises certainly have a desire to grow and develop. Production capacity is accompanied by increased investment. This is not easy due to limited sources of capital. It is also difficult to access third-party capital and innovative capabilities to improve technology and organization and thereby improve performance and efficiency. The technology used is simple, appropriate technology, and operational capacity.

The dimensions of competitiveness according to Li, et.al (2006) are Price, Product quality, Reliable supply or delivery (Delivery Reliability), Product innovation (Product Innovation) and time to market. Likumahwa et al (2019) show that there is an effect of GSCM on competitiveness and organizational performance. Thoo Ai Chin, et al (2015) found The results showed environmental collaboration as a mediating variable between GSCM practices and sustainable performance. Laosirihongthong, et al (2013) Of the five variables of green SCM practices, only legislation has a significant positive relationship with environmental performance. These results indicate that most employees consider that their company's environmental performance will improve by complying with laws and regulations rather than proactively developing green supply management practice.

3. Method

Respondents in this study were fisheries sub-sector business actors, with the location of South Minahasa Regency. Data was collected based on direct observation, interviews and continued with the distribution of questionnaires. The questionnaire used a 5-point LIKERT scale with (1 = strongly disagree) and 5 = strongly agree). To see the Data Validity data using the Convergent Validity method (Loading Factor between 0.6-0.7) and discriminant (AVE> 0.5) and for Reliability Tests carried out based on the Cronach Alfa value 0.6. Hypothesis testing is done using bootstrap resampling with a minimum number of bootstraps of 500 with a confidence level of 95% ( ) 5. The analytical tool used is Partial Least Square (PLS).

4. Results and Discussion

3.1 Statistical Result

South Minahasa Regency occupies the central position of North Sulawesi Province, administratively located in the south of Minahasa Regency with the following boundaries: North bordering Minahasa Regency - East bordering Southeast Minahasa Regency - South bordering Bolaang Mongondow Regency - West bordering Sulawesi Sea. South Minahasa Regency provides high quality products, both cultivated and processed marine products. The main products include seaweed, grouper, and others. Meanwhile, marine aquaculture includes seaweed, grouper, jackfruit (bobara), sea cucumber etc. The production of processed fish products in South Minahasa Regency is very diverse, both traditional and modern. Processed fish products include wooden fish, salted fish, smoked fish/fufu and bakasang.

There are several types of fish farming commodities in South Minahasa Regency, including Tilapia, Mas and other fresh fish, where the largest type of production is Tilapia with a total production in 2020 of 12732.25 tons, and in 2021 it decreased to 7968.23 tons. Meanwhile, business actors in the fisheries sector in Minahasa Regency are quite numerous, totaling 1761 with the largest number of marine fisheries with 1575, and the rest are general fisheries with 186. There are 750 fish cultivation businesses in Minahasa Regency, 1251 ponds, 1737 cages and 90 rice fields. Of the types of aquaculture in South Minahasa Regency, the most people do cage cultivation and the least cultivation in rice fields. The number of research respondents totaled 100 respondents. Furthermore, the data was tested for outer model testing. The outer model test consists of data validity test and data reliability test. In testing the validity of the data, two types of tests were carried out, namely testing using convergent validity and testing with discriminant validity. In testing the validity of data with convergent validity, testing is carried out using the outer loading value and Average Variance Extracted (AVE).

The results of the convergent validity test using outer loading there are invalid indicators so that the indicators are re-tested. The results of the validity test after being tested again can be seen in the table below.

Table 1. Convergent Validity Test Results Using Outer Loading

Indicators	Outer	Status
ED	0.846	Valid
GM	0.774	Valid
GDst	0.854	Valid
RL	0.841	Valid
Cost	0.774	Valid
Time	0.761	Valid
Flexibility	0.761	Valid
KL1	0.828	Valid
KL2	0.854	Valid
KS1	0.727	Valid
KS2	0.858	Valid
KS3	0.741	Valid
KE1	0.756	Valid
KE2	0.721	Valid
KE3	0.821	Valid

Based on table 1 above, all indicators have an outer loading value of more than 0.5.

Table 2. Convergent validity test results with AVE

Indicators	AVE	Description
Green Supply Chain Management	0,585	Accepted
Competitiveness	0,688	Accepted
Sustainable Performance	0,617	Accepted

Based on the above 2, all latent variables have an AVE value of more than 0.5, with the smallest AVE value owned by the GSCM latent variable of 0.585 and the largest AVE value owned by the Competitiveness latent variable of 0.688. Data validity testing with discriminant validity is tested using the cross loading value. Test results with cross loading based on Fornell- Larcker Criterion

Table 3. Test Results with Cross Loading

	GSCM	Competitiveness	Sustainable Performance
Green Supply Chain Management	0,765		
Competitiveness	0,722	0,829	
Sustainable Performance	0,761	0,883	0,786

The square root AVE value of all latent variables is higher than the correlation value between latent variables. This shows that all latent variables have met the Discriminant Validity criteria and have good Discriminant Validity values. Data reliability testing is done by assessing the Cronbach's alpha value and the composite reliability value. Cronbach's alpha value and composite reliability value are in table 4 below:

Table 4. Cronbach's Alpha Value

Indicators	Cronbach's Alpha	Description
Green Supply Chain Management	0,646	Accepted
Competitiveness	0,849	Accepted
Sustainable Performance	0,911	Accepted

From the calculations that have been carried out, it can be seen above that the Cronbach's Alpha value of all latent variables in the model is more than 0.6.

Table 5. Composite Reliability Value

Indicators	Composite Reliability	Description
Green Supply Chain Management	0,809	Accepted
Competitiveness	0,898	Accepted
Sustainable Performance	0,928	Accepted

The composite reliability value of almost all latent variables is more than 0.7 with the lowest value owned by the GSM latent variable with a value of 0.809 and the highest owned by the Sustainable Performance latent variable with a value of 0.928. After all variables and indicators meet the minimum test criteria, the next step is testing the inner model. In testing the inner model, there are three things that must be done, namely R-Square testing, Q-Square testing, and hypothesis testing which includes testing the P-Value, T-Statistic and Original Sample values. The r-square results can be seen in the table, the q-square results can be seen in the table 5, the results of hypothesis testing can be seen in the table 6.

Table 6. R- Square

Indikator	R-Square	Description
Green Supply Chain Management		Accepted
Competitiveness	0,521	Accepted
Sustainable Performance	0,811	Accepted

Table 7. Model Fit Test

	Saturated Model	Estimated Model
SRMR	0,108	0,108

	Saturated Model	Estimated Model
d_ULS	1,392	1,392
d_G	0,948	0,948
Chi-Square	477,871	477,871
NFI	0,627	0,627

rms Theta

rms Theta	0,267

Based on this output, it is obtained that the SRMS value is 0.108, which is less than 0.08. In addition, the NFI value of 0.627 is less than 0.900. The resulting RMS_theta value is 0.267, which is close to the value of 0. From these indicators it can be concluded that the model formed has met the suitability criteria so that the model can be used and is good at describing the relationship between variables. In the formation of the SEM model, there are 2 relationships, namely direct effect and indirect effect. The relationship between variables is significant if the T-Statistic p-value is less than the 5% significance level. The relationship can be seen in the following output.

Table 8. Hypothesis Testing Results

Hypothesis	Original Sample	Sample Mean	Standard Deviation	T-Statistic	P-Value
Competitiveness → Sustainable Performance	0.259	0.278	0.111	2.344	0.021
Green Supply Chain Management → Competitiveness	0.722	0.734	0.050	14.346	0.000
Green Supply Chain Management → Sustainable Performance	0.695	0.679	0.103	6.745	0.000

Based on table 8 above, the original sample value is positive, the t-statistic value is more than 1.96, and the p-value is less than 0.05, which means that it shows that the hypothesis is accepted, this indicates that the exogenous variables in their relationship have a positive and significant effect on the endogenous variables.

Table 9. Specific Indirect Effect

	Specific Indirect Effects	Sample Mean	Standard Deviation	TStatistics	P-Value
Green Supply Chain Management → Competitiveness → Sustainable Performance	0,187	0.207	0.089	2.103	0.038

Table 10. Total Effect

	Competitiveness	Green Supply Chain Management	Sustainable Performance
Competitiveness			0,259
Green Supply Chain Management	0,722		0,883
Sustainable Performance			

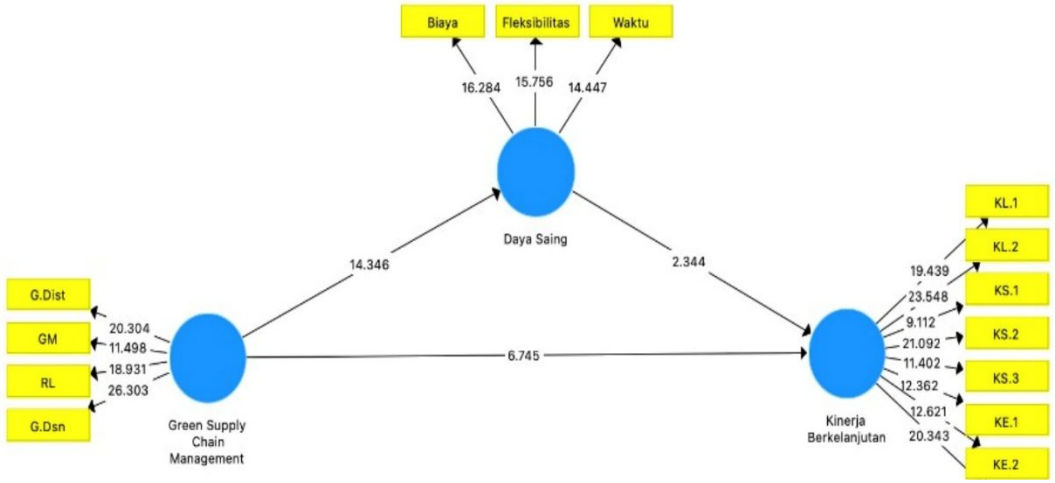

Figure 1. SEM PLS Result

In testing convergent validity, testing is carried out using two metrics, namely the outer loading value and Average Variance Extracted (AVE). Based on the first data processing, there are some data whose value is below 0.5, therefore the data is processed again. After the data is reprocessed all indicators have an outer loading value above 0.5, which indicates that these indicators have a significant contribution to the measured variable.

The analysis results from table 2, which shows the Average Variance Extracted (AVE) value for various latent variables. All latent variables have an AVE value of more than 0.5 This indicates that the latent variables have a good level of recovery. A higher AVE value indicates that the latent variable effectively represents the variation in its indicators.

The smallest AVE value belongs to the GSCM latent variable of 0.585, This indicates that the GSCM latent variable has a slightly lower recovery rate compared to other latent variables. An AVE value close to or below 0.5 may indicate that the variable may not represent the variation in the indicator well. The largest AVE value belongs to the Competitiveness latent variable of 0.688, This indicates that the latent variable has an excellent recovery rate. A high AVE value indicates that the variable effectively represents the variation in its indicators. Overall, the latent variables in the confirmatory factor analysis generally have a good recovery rate, but there are differences in the recovery rate among the latent variables.

Data validity testing with discriminant validity is tested using the cross loading value. Based on the analysis results, it shows that the square root value of AVE (Average Variance Extracted) for all latent variables is higher than the correlation value between latent variables. This shows that all latent variables have met the criteria for Discriminant Validity and have good discriminant value. Thus, all latent variables in the study have good discriminant value, because the square root value of AVE is higher than the correlation value between latent variables.

Data reliability testing is done by assessing the Cronbach's alpha value and composite reliability value. The Cronbach's Alpha value of all latent variables in the model is more than 0.7. This shows that the latent variables in the model have a fairly good level of reliability, because the minimum acceptable value is generally 0.7. This indicates that the measurement instruments used in the model have an adequate level of consistency.

The GSCM latent variable has the lowest Cronbach's Alpha value of 0.646 while the Sustainable Performance latent variable has the highest Cronbach's Alpha value of 0.89. This suggests that the GSCM latent variable may have a lower level of reliability compared to the other latent variables in the model. On the other hand, the latent variable Performance has a higher level of reliability. It can be said that the measurement instruments used in the model have good overall reliability, although the latent variable Sustainable Performance has a lower level of reliability compared to the other latent variables in the model. Almost all latent variables have a Composite Reliability value of more than 0.7, which is generally considered a good minimum threshold for reliability. Thus, it can be concluded that the latent variables have a good level of reliability, In addition, the latent performance variables

show high reliability in measuring related concepts. After all variables and indicators meet the minimum test criteria, the next step is testing the inner model. In testing the inner model, there are three things that must be done, namely R-Square testing, Q-Square testing, and hypothesis testing which includes testing the P-Value, T-Statistic and Original Sample values.

The performance variable has the highest R-Square value of 0.811, which indicates that the variable is significantly influenced by the GSCM variable. The Competitiveness variable has an R-Square value of 0.521, which indicates that the latent variable Competitiveness is influenced by the GSCM latent variable The study has significant predictive relevance. The variables also have positive original sample values: and have mean values that are higher than zero. The t-statistic value is greater than 1.96: The t-statistic value (measures the statistical significance of the difference between the sample mean and zero) for the variables is greater than 1.96. This value indicates that the difference is statistically significant. P-value less than 0.05: The p-value (measures the level of statistical significance) for the variables is less than 0.05. This indicates that there is sufficient evidence to support the proposed hypothesis, namely that exogenous variables (variables measured or manipulated in the study) have a positive and significant influence on endogenous variables (variables observed or predicted in the study).

3.2. Discussion

The influence of green supply chain management on performance in the fisheries sub-sector business in South Minahasa Regency.

Based on the above analysis, it was found that there is a significant influence between GSCM and sustainable corporate performance. The significance value obtained (<0.001 <0.05) indicates that the relationship between the two variables is not merely coincidental. In other words, GSCM directly affects sustainable performance. This indicates that efforts in building mutually beneficial relationships with business partners can have a positive impact on the performance of fisheries sub-sector businesses in South Minahasa district. Based on the results obtained, this study supports the results of previous research, namely Research from Salah M. Diab, et al (2015) where this study aims to examine the impact of GSCM Practices on Organizational Performance: A Study on the Jordanian Nutrition Industry with the results showing that Green SCM has an impact or influence on organizational performance. The implications of this study are; academic implications, and managerial implications. The researchers included all elements of green supply chain management, on organizational performance, namely; environmental performance, financial performance, and operational performance. This research is not in line with the research results of Zhu, et al (2007), where the implementation of GSCM, especially with consideration of external relations, is still poor. Therefore, the implementation of GSCM only slightly improves environmental and operational performance, and has not resulted in a significant improvement in economic performance.

The Effect of Green Supply Chain Management on the Competitiveness of Fisheries Sub-Sector Businesses in South Minahasa Regency.

Based on the above analysis, it is found that there is a significant influence between GSCM on Competitiveness. The significance value obtained (<0.001 <0.05) indicates that there is a relationship between the two variables. In other words, GSCM directly affects Competitiveness in fisheries sub-sector businesses in South Minahasa Regency. The results of this study support the research of Mumni A., Q and Tarbash, M (2020) The relationship between green supply chain management, performance and competitive advantage. This study found a strong positive relationship between GSCM practices and competitive advantage (economic and environmental), and also found a relationship between performance and competitiveness. Likewise, Abdel-Aziz Ahmad Sharabati's research (2021) Green Supply Chain Management and Competitive Advantage of Jordanian Pharmaceutical Industry. The results showed that the relationship between GSCM and CA is very strong. The results also show that green supply chain components affect the CA of JPM organizations, where green operations have the highest influence on total CA, followed by green purchasing and finally, green sales. In addition, green supply chain affects the dimensions of CA in JPM organizations, where GSCM has the highest

influence on quality, followed by innovation, then time, while GSCM has no significant influence on reliability and cost.

The Effect of Competitiveness on the Sustainable Performance of Fisheries Sub-Sector Businesses in South Minahasa Regency

Based on the results of the analysis, it was found that there is a significant influence between competitiveness and sustainable company performance. The significance value obtained (<0.001 <0.05) indicates that there is a relationship between the two variables. In other words, Competitiveness directly affects the sustainable performance of fisheries sub-sector businesses in South Minahasa Regency. The results of the study support Astawa et al (2021) where the results of the competitiveness study significantly affect organizational performance at a p-value <0.05. Competition is an intervening variable that mediates the effect of GSCM practices on organizational performance. The research results are in line with Li et al (2006) that organizational performance is more influenced by competitive advantage.

The Effect of Green SCM on Sustainable Performance through Competitiveness in Fisheries Sub-Sector Businesses in South Minahasa Regency.

Based on the analysis, it is found that there is a significant relationship between GSCM and Sustainable Performance through Competitiveness as an intervening variable. This can be concluded based on the P-value of 0.0018, which is smaller than the 0.05 significance level commonly used in scientific research. This result shows that GSCM has a direct influence on Sustainable Performance through Competitiveness.

5. Conclusion

Based on the results of the analysis and discussion, it can be concluded that there is a significant influence between Green SCM on the performance of business actors in the fisheries sub-sector in South Minahasa Regency. In addition, competitiveness also directly and significantly affects the company's performance on business actors in the fisheries sub-sector of South Minahasa Regency. Sobel test results show that GSCM has a significant effect on performance through competitiveness as an intermediary variable. For Fisheries Sub Sector Business Actors to pay attention to GSCM practices in order to increase the level of Competitiveness and Company Performance in a sustainable manner in the Fisheries Sub Sector Industry in South Minahasa Regency. Based on the research findings, it is recommended to improve competitiveness through the implementation of GSCM implementation to foster mutually beneficial relationships between supply chains along the chain. In addition, companies must also focus on integrating supply chain management through a spirit of good collaboration, thereby improving performance in a sustainable manner for the fisheries sub-sector industry in South Minahasa Regency.

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