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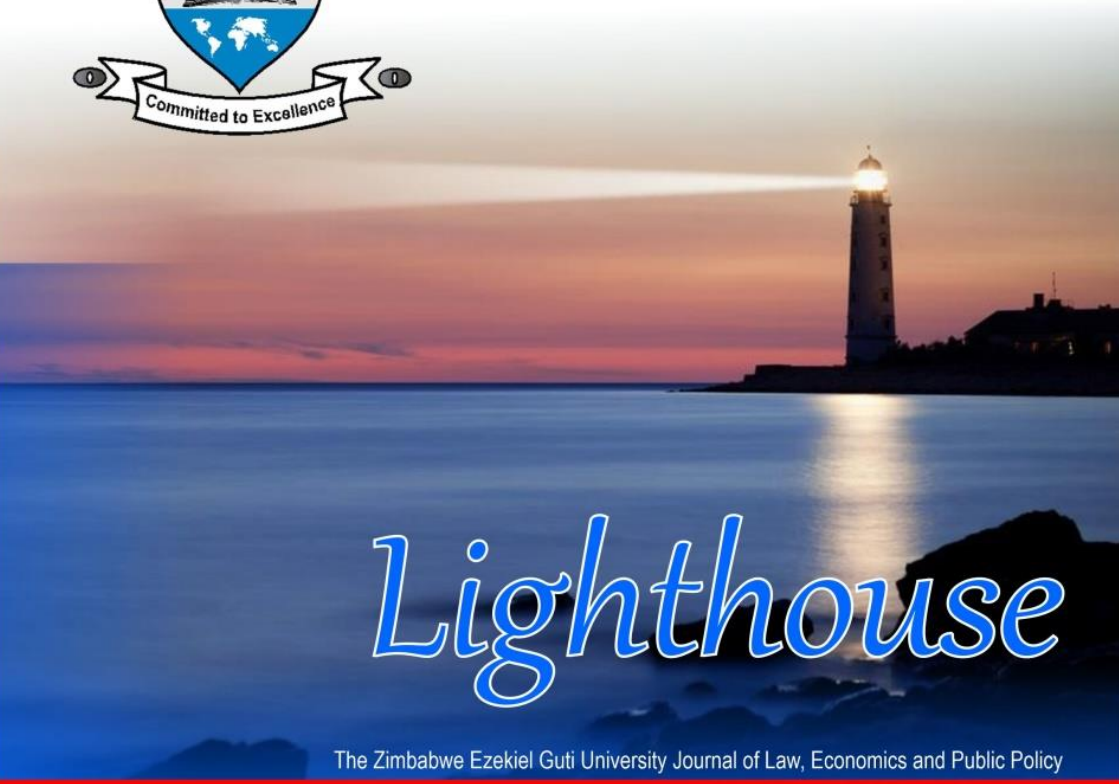

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Demand Conditions and Related Industries on Export Performance in the Zimbabwean Manufacturing Sector

BRIAN S SIBANDA[1]

Abstract

The Zimbabwean manufacturing sector has, for the past two decades, been plagued by significant systemic challenges ranging from volatile economic conditions, poor sector-wide performance capacity utilisation and poor expert performance. Zimbabwe's manufacturing sector has continued to post poor performance returns as evidenced by the declining manufacturing and export returns. Performance has been weakened further by volatile economic conditions, access to forex challenges, weak supply chain linkages, and inadequate innovation ecosystems have hindered sustainable growth. The hypothesised contribution of demand conditions and related and supporting industries to export performance notwithstanding, there is limited continuous research on this subject more so, focusing on Zimbabwe given its unique economic climate. In this regard, this study sought to investigate the effect of demand conditions and related and supporting industries on export performance in the Zimbabwean manufacturing sector. The study employed a descriptive research design, using structured questionnaires to collect data from 384 officials from active manufacturing exporters. Multiple Linear Regression Analysis (MLR) was used to analyse the findings. The study found that both demand conditions and related and supporting industries have a significant positive effect on export performance. The study concludes that favourable demand conditions and robust related and supporting industries are critical for enhancing export performance in Zimbabwe's manufacturing sector. The study has

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contributed to theory, policy and practice by providing empirical evidence from Zimbabwe, proposing policy recommendations to policymakers in Zimbabwe and practical solutions to the manufacturing sector.

Keywords: demand conditions, related and supporting industries, export performance, manufacturing sector, research and development, supply chain.

INTRODUCTION

As globalisation continues to advance, demand conditions together with related and supporting industries have become vital elements that determine how efficiently countries export their products (Ayuda *et al.*, 2022; Dressler, 2023). Demand conditions describe the sophistication and complexity of both domestic and international demand for products and services from a country while influencing how competitive its industrial sectors become (Porter, 1990). In contrast, related and supporting industries represent a network of suppliers and complementary industries that deliver essential resources and innovations to manufacturing companies in support of their operations at every level (Porter, 1990). When combined, these factors work as a complete system to either support or constrain a country's global market competitiveness. Zimbabwe as a developing country requires a deep comprehension of demand conditions and related industries to be able to revitalise its manufacturing sector and boost export performance.

The global demand conditions continue to evolve because of three primary factors, namely, technological advancement, changing consumer preferences and emerging market expansion (Khodakarami *et al.*, 2022). The global market demonstrates significant growth in demand for products that are characterised by high quality along with sustainability and technological superiority because consumers demand environmentally friendly and digitally advanced solutions

(Baena-Rojas *et al.*, 2021). Developing countries face challenges in addressing modern market requirements because their technological capabilities are limited and their infrastructural capacity and investment in innovation are inadequate (Khodakarami *et al.*, 2022). The current export performance gap between developed and developing countries continues to increase. According to World Bank (2024), the manufacturing export performance of Zimbabwe has shown significant volatility over the past two decades that is evident in -48.9% manufacturing export growth in 2021 and 43.9% in 2022 that demonstrate the sector's sensitivity to external shocks and internal operational challenges.

The Southern African Development Community (SADC) plays a pivotal role in fostering regional economic growth by prioritising industrialisation and export-oriented development as cornerstones for advancing its member states (Gawe, 2021). This regional focus reflects the recognition that robust industrialisation, coupled with enhanced export capabilities, is essential for achieving economic resilience and shared prosperity among member countries (Moyo, 2020). However, SADC's vision has faced significant challenges, including political instability, underdeveloped technological infrastructures, and volatile domestic market demands, which collectively undermine the competitiveness of supply chain ecosystems (Moyo, 2024; Pretorius, 2024). For Zimbabwe, these regional challenges are compounded by domestic issues, such as weak industrial performance and limited value addition. Despite its strategic importance within the region, Zimbabwe's manufacturing sector has struggled to contribute meaningfully to SADC's industrialisation agenda, relying heavily on the export of raw materials rather than processed goods (Khobai & Moyo, 2021).

The manufacturing sector's decline in contribution to GDP, from 24.1% in 1991 to 16.4% in 2023, is a reflection of the stagnation and inefficiencies within Zimbabwe's manufacturing base (Moyo, 2020).

This underperformance is symptomatic of deeper structural challenges, including reliance on imported inputs, which elevate production costs and diminish market competitiveness (Gawe, 2021). While SADC promotes integration into regional value chains, Zimbabwe's inability to reindustrialise and enhance value addition significantly hampers its participation in the broader economic objectives of the community (Duma, 2021; Moyo, 2024). Addressing these domestic limitations is not only critical for reviving Zimbabwe's manufacturing sector but also for aligning its efforts with SADC's overarching goals of creating interconnected and competitive economies.

The Zimbabwean manufacturing sector suffers from various internal challenges such as hyperinflation, poor infrastructural development and limited access to foreign currency. These challenges have weakened the manufacturing sector's responsiveness when dealing with market demand within Zimbabwe and in the export market. World Bank data shows the declining competitiveness of the Zimbabwean economy through a decrease in export-to-GDP ratio from 34.8% in 2011 to 21.01% in 2024 (Chikowore & Chawarika, 2024). The sector faces restricted innovation possibilities and struggles with value-addition because the supporting industrial network shows limited development (Shadreck *et al.*, 2024). The textile industry in Zimbabwe experienced a decline in exports because of overseas competition from low-cost imports and its poor investment in advanced technology despite potential market opportunities in organic cotton products (Mahuni *et al.*, 2025). The situation requires a strategic approach toward developing supportive industrial networks that will strengthen export industry performance.

Weak demand and underdeveloped related industries presents a widespread issue that developing countries such as Zimbabwe have to contend with. apart from effective demand condition utilisation, South Korea and Germany have attained industrial and export success

at the back of strategic implementation of tailored policies, strong institutional frameworks and innovative investments (Germann, 2023). A policy environment characterised by inconsistent implementation coupled with inadequate budget support and minimal private sector partnership exists in Zimbabwe thus adversely impacting on industrial growth (ZimTrade, 2022). The Zimbabwe National Industrial Development Policy (ZNIDP) failed to produce significant results because of domestic currency volatility, foreign currency shortages and insufficient support manufacturing industry clusters and supply chain ecosystems (Bvirindi, 2021). Addressing these challenges requires a multifaceted approach that includes policy reforms, investment in infrastructure, and the development of a robust industrial ecosystem (Bvirindi, 2021).

In this regard, the study sought to provide actionable insights that can guide policymakers and industry stakeholders in revitalising Zimbabwe's manufacturing sector. By casting effulgence on the critical role of demand conditions and related and supporting industries, the study sought to agitate for the development of targeted policies that address supply chain inefficiencies, foster innovation, and enhance value addition. In addition, the findings are anticipated to contribute to academic discourse by offering empirical evidence on the relationship between these factors and export performance in a developing economy context. Ultimately, the study sought to lay the groundwork for sustainable industrial growth, improved export competitiveness, and increased contribution of the manufacturing sector to Zimbabwe's GDP.

CONCEPTUAL FRAMEWORK

Figure 1 illustrates the hypothesised relationship between the independent variables (demand conditions and related and supporting industries) and the dependent variable (export performance). The relationships depicted in Figure 1 are grounded in Porter's Extended Diamond Model by Porter (1990). In the extended diamond model.

Porter (1990) has argued that amongst other factors, demand conditions and related and supporting industries play a pivotal role in influencing national competitive advantage and by extension, export performance.

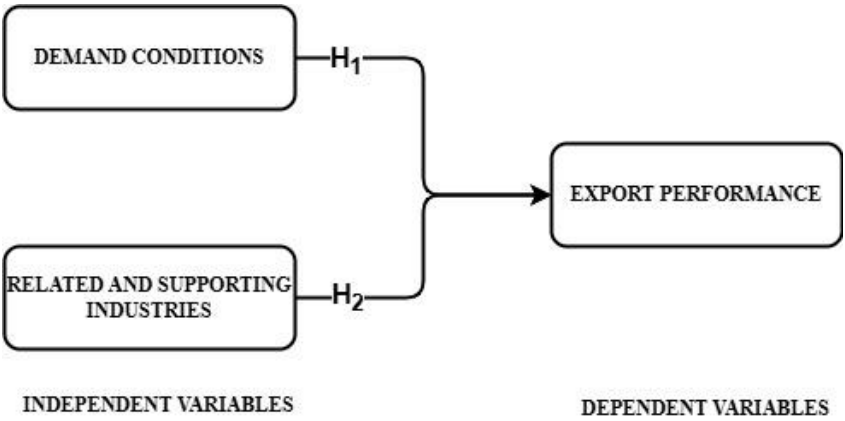

Figure 1: *Conceptual Framework*

Demand conditions refer to the nature and sophistication of domestic and international demand for products, influencing export competitiveness (Porter, 1990). Related and supporting industries represent the network of suppliers, industrial clusters, and innovation ecosystems that provide essential inputs and services to manufacturing firms (Porter, 1990). Export performance reflects the ability of a country or firm to successfully compete in international markets, driven by favourable demand conditions and robust industrial ecosystems (Fugazza, 2018; Mata *et al.*, 2021).

LITERATURE REVIEW

This section reviews the literature on the relationship between demand conditions, related and supporting industries, and export performance. It explores how favourable demand conditions and robust industrial ecosystems contribute to export success, while also

examining the challenges and trade-offs faced by developing countries like Zimbabwe. The review is structured into two main subsections, that is, demand conditions and export performance and related and supporting industries and export performance, each highlighting key theoretical and empirical insights.

DEMAND CONDITIONS AND EXPORT PERFORMANCE

A strong and growing demand for a country's products in international markets can drive export growth, while weak or volatile demand can hinder performance (Fugazza, 2018). Andritzky *et al*. (2019) and Cadogan *et al*. (2022) argue that favourable demand conditions enable exporters to capitalise on market opportunities, tailor their products to meet consumer needs, and gain a competitive advantage. However, the relationship between demand conditions and export performance is not uniform across business environments. Girma *et al*. (2019) found a weak relationship between foreign demand and export performance in Ethiopia, suggesting that factors like infrastructure constraints and institutional barriers may play a more significant role in certain developing economies.

The strong foundation of a stable domestic market allows exporters to use local market intelligence for developing products that match foreign market requirements (Ahmad *et al.*, 2024). Aw *et al*. (2020) and Bournakis and Tsoukis (2021) found that robust home market demand caused by domestic income growth and population growth creates positive conditions for export success. The expansion of Chinese exports depended heavily on growing domestic market demand combined with changes in consumer behaviours (Bagaria & Ismail, 2019). According to Cadot and Fernandes (2021) developing countries that enjoy strong domestic consumption patterns discourage manufacturers from becoming more diversified exporters because companies choose to serve domestic markets instead of expanding into new markets overseas. The foregoing findings demonstrate that

domestic demand enhances export performance yet the economic conditions determine the nature of trade-offs that emerge.

Market size in export destinations constitutes a vital element for determining export performance results (Cadot & Fernandes, 2021). Large markets enable companies to achieve economies of scale that improve their competitiveness and profitability (Odior, 2023). The market size is significantly influenced by economic growth together with trade agreements and regulatory frameworks (González *et al.*, 2022). Through trade agreements that reduce tariffs, exporters gain expanded market access however logistical challenges together with trade barriers restrict market growth potential (Aghion *et al.*, 2024). According to Labanca *et al.* (2022) businesses should understand competitive dynamics of their export destinations to properly evaluate growth potential. The choice between markets with low competition and markets with intense competition influences new business entry opportunities and barriers (Labanca *et al.*, 2022). Business success depends on making strategic market choices that successfully combine market dimensions with marketplace competition dynamics (Kilimvi & Mawarire, 2023).

Customer preferences remain a fundamental element of demand conditions that directly affects export performance outcomes (Labanca *et al.*, 2022). For export success, manufacturers must continuously study and accommodate the needs and preferences of their international customers (Wang *et al.*, 2022). Businesses that adapt their products to match customer preferences to achieve better export revenue alongside stronger customer brand commitment (Aswin *et al.*, 2020). Innovation also serves as a fundamental element in this process because it provides businesses capabilities to be agile and responsive to changes in customer demand and preferences while creating products tailored for unique market segments (Puspitasari *et*

al., 2021). Research shows that the relationship between customer preferences and export performance is not always statistically significant. Some exporting companies succeed by leveraging their brand image and reputation rather than obtaining deep understanding of regional customer preferences (Dressler, 2023). In this context, customer preference alignment therefore, enhances performance but does not represent a necessary condition for every organisation and market sector (Dressler, 2023).

The study therefore, hypothesised that: $\mathbf{H_1}$: Demand conditions have a significant positive effect on export performance.

Numerous studies show that related supporting industries play a crucial role in enhancing export performance as they drive manufacturers towards attainment of competitive advantage. According to Mata *et al*. (2021) properly integrated supply chain networks serve as key components of related industries to improve export performance by enabling better collaboration and operational efficiency. Supply chain connections enhance export performance export due to integrated networks of suppliers that in turn create operational efficiency and market adaptation capabilities (Baldwin & Harrigan, 2021). In the same context, Hidalgo *et al*. (2022) found that diverse industrial structures enhance export performance at the country level because interconnected industries lead to better adaptation to global market requirements that improves economic results. Related industries that share knowledge with each other facilitate both innovation and competition for export market success (Hidalgo *et al.*, 2022).

According to Santamaría *et al*. (2020) enhancing export performance stems from institutionalised collaboration and knowledge sharing practises that build continuous innovation and improvement. Maskell

and Malmberg (2019) established that the proximity of related and supporting industries enables knowledge spill overs that improves export market competitiveness. Hu and Mathews (2021) found that Chinese manufacturers who concentrated on the domestic market weakened their export potential that highlights the need for industries to develop strategic approaches for their export business. This confirms that developing networks that facilitate knowledge sharing and innovation acts as the substratum to export performance improvement.

Brache *et al*. (2022) showed that South Korea's strong R&D ecosystem supports technological advancements that directly translate into improved export capabilities. Leydesdorff (2020) highlighted the triple helix model involving government, industry, and academia that that fosters innovation and strengthens export performance. Furthermore, Liu *et al*. (2023) demonstrated that robust innovation capacity, facilitated by effective R&D ecosystems, equips industries to meet global market demands.

Export performance improves significantly as a result of the collaboration that takes place between industry clusters and industry associations (Hu & Mathews, 2021). According to Ahedo (2004) concentrated geographical manufacturing clusters enable better resource sharing and knowledge spill overs between members that leads to the attainment of competitive advantage for improved export performance. Industry association collaborations lead to joint marketing efforts that when combined with resource optimisation stimulates export performance growth (Mishra *et al.*, 2019). The study by Galtsova *et al*. (2020) confirms that industry clusters enhance economic competitiveness due to organisation-level collaboration toward common objectives. Industrial associations and clusters function as collective platforms that enable business resource sharing,

expertise exchange and collective challenge management leading to enhanced export performance (Galtsova *et al.*, 2020).

Strong supply chains under related industries enhance export competitiveness through better o-operational performance and improved business-to-business cooperation (Mata *et al.*, 2021; Baldwin & Harrigan, 2021). Research and development (R&D) ecosystems function as key supporting industries by promoting innovation that helps businesses meet international standards (Brache *et al.*, 2022; Leydesdorff, 2020). Industry clusters and associations establish platforms that combine knowledge exchange features with joint marketing initiatives and policy advocacy activities to increase export abilities (Ahedo, 2004; Galtsova *et al.*, 2020). Industry associations enable companies to achieve competitive advantage by sharing resources (Mishra *et al.*, 2019).

In view of the review of literature above and the findings, the study hypothesised that:

H_2: Related and supporting industries have a significant positive effect on export performance.

As evident in the foregoing literature review, studies, (Aghion *et al.*, 2024; Ahmad *et al.*, 2024) have explored demand conditions and related industries, emphasizing their impact on export performance and economic growth. In Zimbabwe, Bvirindi (2021) and Chikowore and Chawarika (2024) have highlighted the role of demand conditions and industrial linkages in shaping export outcomes but the studies do not explore the joint effects of these factors on export performance. While Porter (1990) framework underscores the importance of related and supporting industries, its application in Zimbabwe's context is underexplored. Studies by Gawe (2021) and Kilimvi and

Mawarire (2023) have examined Zimbabwe's trade policies and financial systems but lack a focused analysis of how demand conditions and industrial linkages influence export competitiveness. This study addresses this gap by investigating the relationship between demand conditions, related industries, and export performance in Zimbabwe, drawing on insights from Fugazza (2018) and Mata *et al*. (2021).

RESEARCH METHODOLOGY

The researcher adopted a descriptive research design guided by a positivist research philosophy, using quantitative methods to test hypotheses against measurable evidence for generalizable findings. The descriptive design enabled systematic research data collection and analysis to examine the current demand conditions and related and supporting industry landscape in Zimbabwe and its effect on export performance. A data collection was done through a structured 5-point Likert scale questionnaire that enabled the researcher to identify patterns and establish relationships and monitor trends throughout the data sample. This research targeted officials from the active manufacturing product-exporting organisations across Zimbabwe and a total of 931 individuals made up the study population. In this regard, the study population consisted of senior managers from non-export portfolios, export managers, finance and accounting officials working in these organisations. The researcher applied Cochran's formula to determine the sample size while using a 95% confidence level and a 5% margin of error for calculation purposes and this computed a sample size of 384 individuals. To achieve proportional representation, the researcher applied stratified random sampling to select 384 participants from the target population. Achieving proportional representation through stratified random sampling was critical for ensuring the validity and reliability of this study. By dividing the study population of 931 individuals into homogeneous strata based on their roles and export product

categories, the researcher ensured that the selected sample of 384 participants accurately reflected the diversity within Zimbabwe's manufacturing exporters. This approach minimised sampling bias, enhanced the generalisability of the findings, and allowed for a comprehensive analysis of trends and challenges across various segments of the sector. The researcher distributed the structured questionnaires through a google forms link that was shared via email and WhatsApp with the participants. The questionnaire utilised Likert-scale questions throughout its various sections to solicit responses that ranging from 1 (Strongly Disagree) to 5 (Strongly Agree). The standardised data collection approach through the questionnaire created consistent measurement while also allowing for easy quantitative statistical analysis. Multiple Linear Regression Analysis (MLR) was used as the primary data analysis approach for the study. To perform the MLR analysis, diagnostic tests were first performed to meet the assumptions of multicollinearity and autocorrelation with a view to also guarantee the robustness of the regression model. The Variance Inflation Factor (VIF) was used to test multicollinearity and the Durbin-Watson test was used to test autocorrelation. To test the normality of the data, the Kolmogorov-Smirnov (K-S) and Shapiro-Wilk tests were used. In the main, the multiple linear regression analysis was conducted at 95% confidence level and a 5% level of significance.

FINDINGS

This section presented the findings from the study starting with tests for normality, autocorrelation and multicollinearity followed by the multiple linear regression analysis results. The results from the MLR analysis were also used to test the research hypotheses.

TEST FOR NORMALITY, AUTOCORRELATION AND MULTICOLLINEARITY

The Kolmogorov-Smirnov and Shapiro-Wilk tests in Table 1 were used to test the extent to which the data was normally distributed.

Table 1: *Results of the Kolmogorov-Smirnov and Shapiro-Wilk Tests*

	Kolmogorov-Smirnov[a]			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Demand Conditions (DC)	.103	259	>0.05	.951	259	>0.05
Related and Supporting Industries (RSI)	.148	259	>0.05	.910	259	>0.05
Export Performance (ExPerf)	.158	259	>0.05	.883	259	>0.05

a. Lilliefors Significance Correction

The results of the Kolmogorov-Smirnov (K-S) and Shapiro-Wilk tests indicate that the data for Demand Conditions (DC), Related and Supporting Industries (RSI), and Export Performance (ExPerf) are normally distributed, as all p-values (Sig.) are greater than 0.05 for both tests. This suggests that the residuals meet the normality assumption required for valid regression analysis.

The study further tested whether the data satisfied the assumptions of multicollinearity and autocorrelation using the Tolerance and Variance Inflation Factor (VIF) and the Durbin-Watson tests respectively. The results are given in Table 2.

Table 2: *Autocorrelation and Multicollinearity Results*

Variable	Durbin-Watson	Tolerance	VIF
Model 1	1.951		
DC		0.401	2.706
RSI		0.734	6.882

The Durbin-Watson statistic of 1.951 indicates no significant autocorrelation given the fact that the value lies between 1.5 and

2.5 and this guarantees the independence of residuals in the regression model. The Tolerance and VIF values for demand conditions (DC) (Tolerance = 0.401, VIF = 2.706) and related and supporting industries (RSI) (Tolerance = 0.734, VIF = 6.882) revealed that there existed no significant multicollinearity (Tolerance>0.10; VIF<10).

MULTIPLE LINEAR REGRESSION ANALYSIS

The results from the multiple linear regression analysis are given in Table me hereunder.

Table 3: *Multiple Linear Regression Analysis Results*

Model	Variable	Adj-R^2	F/Sig	Unstandardized Coefficients (ß)	Standardized Coefficients (Beta)	T-test, P-value
	Constant			1.929	-	15.495 / 0.000
1	DC	0.698	127.074 / 0.000	0.178	0.270	2.324 / 0.021
	RSI			0.300	0.449	3.862 / 0.000

The regression model (Table 3) explains 69.8% of the variance in export performance (Adjusted R^2 = 0.698), indicating a good fit. The regression model's ability to explain 69.8% of the variance in export performance (Adjusted R^2 = 0.698) highlights a strong fit, indicating that the independent variables significantly influence export outcomes and validating the study's findings. This robust explanatory power enhances the credibility of the research, providing a reliable basis for policy recommendations and contributing meaningfully to the understanding of export performance in Zimbabwe's manufacturing sector. Furthermore, the high Adjusted R^2 value suggests that the model captures the majority of the critical factors driving export performance, reducing the likelihood of omitted variable bias. The F-statistic of 127.074 (p = 0.000) confirms that the

model is statistically significant, meaning that the predictors (DC and RSI) collectively have a significant impact on export performance. These results demonstrate that both demand conditions and related and supporting industries are key drivers of export performance, with RSI having a relatively stronger influence.

H1: DEMAND CONDITIONS HAVE A SIGNIFICANT POSITIVE EFFECT ON EXPORT PERFORMANCE.

The regression results support H_1, as Demand Conditions (DC) have a statistically significant positive effect on export performance (β = 0.178, p <0.05). The standardized coefficient (Beta = 0.270) indicates that a one-unit increase in demand conditions is associated with a 0.270 standard deviation increase in export performance, holding other variables constant. This finding aligns with the hypothesis, suggesting that favourable demand conditions, such as strong domestic and international demand, enhance the export performance of Zimbabwe's manufacturing sector.

H2: RELATED AND SUPPORTING INDUSTRIES HAVE A SIGNIFICANT POSITIVE EFFECT ON EXPORT PERFORMANCE.

The results strongly support H_2, as Related and Supporting Industries (RSI) have a highly significant positive effect on export performance (β = 0.300, p = 0.000). The standardized coefficient (Beta = 0.449) indicates that a one-unit increase in the strength of related and supporting industries is associated with a 0.449 standard deviation increase in export performance. This indicates that stronger linkages with related and supporting industries significantly enhance export capabilities. Industries that provide inputs, logistical support, and innovation ecosystems contribute directly to improving manufacturing efficiency and export success. The stronger relationship (higher Beta) compared to demand conditions demonstrates the critical role of collaboration within supply chains, R&D ecosystems, and industry associations. Encouraging partnerships and fostering well-integrated industrial clusters can therefore

substantially boost export performance, making this a key focus area for policymakers and industry stakeholders.

DISCUSSION

The findings confirm that demand conditions (DC) have a significant positive effect on export performance (β = 0.178, p < 0.05), supporting H_1. This aligns with the literature that highlights that strong domestic and international demand drives export growth by enabling companies to capitalise on market opportunities and tailor products to meet consumer needs (Fugazza, 2018; Andritzky *et al.*, 2019). In the Zimbabwean context, this suggests that having greater access to foreign markets and tap into the growth in such markets can enhance export performance. However, as noted by Girma *et al.* (2019), infrastructure limitations and institutional barriers in Zimbabwe may limit the extent that manufacturing exporters can benefit from demand conditions. Therefore, while favourable demand conditions are crucial, addressing structural challenges such as unreliable energy supply, poor transportation networks, and limited access to finance is equally important to unlock export growth.

The results also strongly support H_2, showing that related and supporting industries (RSI) have a highly significant positive effect on export performance (β = 0.300, p = 0.000). This finding is consistent with the literature that emphasizes the critical role of industrial ecosystems, such as supplier networks, R&D ecosystems, and industry clusters, in enhancing export capabilities (Mata *et al.*, 2021; Baldwin & Harrigan, 2021). In Zimbabwe, the underdevelopment of related and supporting industries has been a major constraint on export performance. For example, weak linkages between the agricultural sector and agro-processing industries have limited value addition and export diversification (Kanyenze *et al.*, 2017). Strengthening these linkages through policies that promote collaboration, innovation, and

knowledge sharing can significantly boost export performance. The stronger relationship (Beta = 0.449) compared to demand conditions underscores the importance of fostering well-integrated industrial clusters and R&D ecosystems, as seen in successful cases like South Korea (Brache *et al.*, 2022).

Collectively, the findings highlight the interconnectedness of demand conditions and related and supporting industries in driving export performance. While demand conditions provide the market opportunities, related and supporting industries enable companies to capitalise on these opportunities through innovation, efficiency, and competitive advantage. In Zimbabwe, addressing both factors is essential for sustainable export growth. Policies should focus on stimulating domestic demand through economic reforms, while simultaneously building a robust industrial ecosystem that supports value addition, innovation, and collaboration. In addition, trade agreements and infrastructure investments can expand market access and reduce logistical barriers, further strengthening Zimbabwe's export performance.

The study focused on Zimbabwe's manufacturing sector and that limits the generalisability of the findings to other sectors or countries with different economic and institutional contexts. The cross-sectional design of the study restricts the ability to establish causal relationships between demand conditions, related industries, and export performance. Comparative studies across different countries in SADC could provide deeper insights into how contextual factors, such as institutional quality and infrastructure development influence export performance. Investigating the role of digital technologies and innovation ecosystems in enhancing export performance can also be a key area of research, particularly in developing economies like Zimbabwe.

CONCLUSION AND RECOMMENDATIONS

This study has found that demand conditions and related and supporting industries (RSI) have a significant positive effect on export performance in Zimbabwe's manufacturing sector. The findings indicate that favourable export market demand, characterized by strong international demand and access to large markets, enhances export performance. Similarly, robust RSI, particularly, supplier networks, industrial clusters, and innovation ecosystems, play a significant positive role in improving export capabilities. These results align with existing literature that that emphasizes the importance of market opportunities and industrial linkages in driving export success (Fugazza, 2018; Mata *et al.*, 2021). For Zimbabwe, these findings underscore the need to address structural challenges and leverage current policies to strengthen both demand conditions and RSI. Enhancing export performance requires policymakers to work on building export market demand through trade agreements which includes regional integration plans like the African Continental Free Trade Area (AfCFTA). Exporters can identify the appropriate markets and create suitable marketing plans by actively monitoring changes in customer demand (Cadogan *et al.*, 2022). In addition, targeted market research and export promotion programmes, such as those led by ZimTrade, can help identify high-demand export markets and tailor products to meet international consumer preferences. The drive to enhance related and supporting industries should prioritise the formation of industrial clusters and strengthening of supply chain linkages and innovation promotion.

These initiatives align with the current Vision 2030 policy, places value chain and industrial cluster development as priorities. However, the operationalisation of these initiatives require significant investment and coordination programmes that should be prioritised by policymakers and the manufacturing sector. As argued by Brache *et al*. (2022), strong R&D ecosystems and industrial

clusters are critical for technological advancements that improve export capabilities. Similarly, public-private partnerships (PPPs) should be encouraged to address infrastructure challenges, such as unreliable energy supply and poor transportation networks that hinder the growth of RSI. The National Development Strategy 1 (NDS1: 2021-2025) also highlights the importance of infrastructure development and industrialisation, therefore, such should be treated as a policy springboard for these efforts.

The findings of this study have far reaching implications for policymakers and industry stakeholders. For policymakers, they highlight the need for strategic investments in infrastructure, innovation ecosystems, and industrial cluster development to enhance export competitiveness. Strengthening supply chain linkages and fostering regional integration initiatives, such as the African Continental Free Trade Area (AfCFTA), are essential for driving export growth. For industry stakeholders, the study underscores the importance of aligning production strategies with evolving global demand, leveraging supplier networks, and embracing innovation to maintain a competitive advantage. Collectively, these efforts have the potential to revitalise Zimbabwe's manufacturing sector and significantly improve its export performance.

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COMPETING INTERESTS

The author declares that they have no financial or personal relationships that could have influenced the research process or the writing of this article.

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The study complied with all ethical guidelines as set forth by Chinhoyi University of Technology (CUT) and in addition, anonymity, confidentiality, informed voluntary consent and protection from hard were some of the ethical principles that were upheld throughout this research study.

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DATA AVAILABILITY

The data used to support the findings of this study are included in the article. Further data can be provided upon reasonable request.

DISCLAIMER

The opinions and views expressed in this article belong solely to the author and do not reflect the official position of any affiliated institution or the publisher. The authors are entirely responsible for the content, findings, and conclusions presented in this article.

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