EFFICIENT MANAGEMENT OF THE SUPPLY CHAIN THROUGH DIGITAL TECHNOLOGY AND THE MEDIATED ROLE OF SUPPLY CHAIN FINANCE FOR THE RETAIL INDUSTRY

PhD. Nhan Cam Tri*

Abstract: ***The purpose of this paper is to understand the impact of digitization on supply chain efficiency under the mediation of supply chain finance. 344 employees and managers at small and medium-sized businesses in Vietnam's retail sector were interviewed for the article. The research model is a partial least squares structural model (PLS-SEM), processed by SmartPLS 4.0 software through two steps. Research results show that supply chain finance has a positive and significant impact on supply chain effectiveness. The external environment, negotiation, digitizing technologies, information sharing, and financial institutions have a positive influence on supply chain finance. The outcomes also confirmed the intermediary role of supply chain finance. The study's findings have helped demonstrate the research topic empirically in Vietnam, a developing nation with a rapidly evolving retail sector influenced by digitalization. In practice, research results are the basis for helping managers establish sustainable business strategies.***

• Keywords: *Digitizing technologies, external environment, information sharing, financial institutions, negotiation, supply chain.*

Date of receipt: 25th Feb., 2025
Date of delivery revision: 04th Mar., 2025
Date of receipt revision: 30th May, 2025
Date of approval: 30th Jun., 2025
DOI: https://doi.org/10.71374/jfar.v25.i4.24

1. Introduction

Effective supply chain management plays a significant role in expanding business reach, establishing market dominance, and building customer trust (Nguema et al., 2020). By optimizing supply chain activities, businesses can gain a competitive edge in their industry and achieve substantial profits (Ali et al., 2020). Therefore, developing a robust supply chain management system is a critical priority.

Adequate financial resources are crucial for ensuring the efficient functioning of supply chains, especially for small and medium-sized enterprises (Gornall & Strebulaev, 2018). Financial support supplies the working capital needed for operations (Lamoureux & Evans, 2012). To access funding from organizations, businesses must demonstrate effective operations and risk management (Pfohl & Gomm, 2009). This highlights the role of supply chain finance in enhancing supply chain efficiency.

Research has identified various factors influencing supply chain efficiency, including financial institution support, interest rates, inflation, government policies, and industry regulations (Nguema et al., 2020; Ali et al., 2020). Additionally, collaboration and negotiation are proven to play a critical role (Nguema et al., 2020; Ali et al., 2020; Carnevale & Isen, 1986; Lamoureux & Evans, 2012). The impact of digitization on supply chain finance has also been attributed to advancements in Industry 4.0 technology (Nguema et al., 2020; Bui & Nguyen, 2023).

A review of studies reveals that research on factors affecting supply chain efficiency within the context of digitization and supply chain finance remains limited, with existing findings primarily based in China (Nguema et al., 2020; Ali et al., 2020). In Vietnam, following the containment of the COVID-19 pandemic, retail supply chain operations have undergone significant changes. Many businesses have enhanced the digitization of supply activities to meet customer demands and boost competitiveness (Thi Ngoc Bich et al., 2022). While initial retail stores - ranging from groceries, fashion, and pharmaceuticals to food and beverage outlets - often perform well, subsequent stores tend to experience reduced sales and operational inefficiencies. Despite these developments, no studies in Vietnam have explored the impact of supply chain finance on supply chain efficiency in the context of digitization, highlighting a research gap.

This study aimed to examine how digitization

* *Ho Chi Minh City University of Economics and Finance (UEF)*

influences supply chain effectiveness in Vietnam's retail industry, with supply chain finance as a mediating factor. Theoretically, it provides empirical evidence on factors affecting retail supply chain performance in a developing country where supply chain activities are widespread. Recent technological advancements have driven noticeable changes in operations. Practically, the findings can guide small and medium-sized enterprises to adopt supply chain finance, enhancing efficiency in the retail sector within a technological context.

2. Literature review

2.1. Supply chain finance and supply chain effectiveness

Supply chain finance plays a vital role in sustaining business operations, particularly for small and medium-sized enterprises (SMEs). It is approached from two perspectives: one focuses on financial activities aimed at generating monetary benefits (Basu & Preetam, 2013), while the other emphasizes its role in fostering relationships among supply chain participants (Gelsomino et al., 2014).

Managing finances effectively remains a significant challenge for SMEs (Pfohl & Gomm, 2009). To support these businesses, financial institutions actively participate in creating an ecosystem that provides the necessary working capital promptly (Lamoureux & Evans, 2012). Supply chain finance benefits buyers, sellers, and financial institutions by enhancing financial efficiency.

Supply chain efficiency is often measured across four dimensions: (1) reducing transaction costs, (2) lowering warehousing costs, (3) cutting inventory costs, and (4) minimizing distribution costs (Fugate et al., 2009). Supply chain finance is recognized as an effective method for cost reduction and improving business agility, particularly in areas such as transportation, storage, and distribution (Nguema et al., 2020).

Moreover, the value of supply chain finance is assessed by financial institutions based on the relationships among supply chain participants, reflecting their level of trust, commitment, and profitability (Ali et al., 2020). This dynamic demonstrates how supply chain finance fosters efficiency, enabling businesses to secure loans from financial institutions. These findings have been supported by previous studies (Gelsomino et al., 2014; Nguema et al., 2020; Mulchandani et al., 2023). Based on this, the following research hypothesis is proposed:

Hypothesis H1. Supply chain finance has a positive impact on supply chain effectiveness

2.2. Collaboration and supply chain finance

Supply chain operations inherently involve various risks (Ali et al., 2020). To address these, collaboration among supply chain participants is essential, as it reflects trust and commitment, trust being the most critical element (Capaldo & Giannoccaro, 2015). Such collaboration enhances cohesion and enables real-time information sharing and joint planning, both of which are crucial for mitigating the adverse effects of disruptions (Dubey et al., 2018).

Collaboration also improves supply chain performance and, consequently, overall business performance (Nguema et al., 2020). Furthermore, cooperative efforts reduce transaction costs, as Industry 4.0 requires all supply chain participants to adapt to technological advancements (Kamble et al., 2020). Engagement with external stakeholders not only strengthens internal value but also boosts competitive advantages (Powell et al., 1996).

To measure collaboration, Simatupang & Sridharan (2005) identified four key factors: sharing demand forecasts, inventory policies, price changes, and supply disruptions with suppliers. Previous studies have highlighted the advantages of collaboration, particularly in facilitating access to supply chain finance (Mulchandani et al., 2023; Nguema et al., 2020). Based on this, the following research hypothesis is proposed:

Hypothesis H2. Collaboration has a positive impact on supply chain finance

2.3. Negotiation and supply chain finance

Negotiation is defined as reaching a joint decision between two parties on a specific issue (Carnevale & Isen, 1986). In supply chain operations, it helps buyers and sellers resolve disputes and balance mutual interests. Negotiation plays a crucial role in supply chain finance, as it reflects both parties' commitment to the supply chain (Liebl et al., 2016).

To measure supply chain finance, Ali et al. (2020) identified five factors: hedging system, coordinated capital flow, supply chain efficiency, hedging capacity, and technology capacity. Negotiation is evaluated using Janda & Seshadri's (2001) scale, focusing on win-win opportunities, negotiation time, and consensus. Previous studies have shown that effective negotiation improves access to supply chain finance (Ali et al., 2020; Mulchandani et al., 2023). Based on this, the following research hypothesis is proposed:

Hypothesis H3. Negotiation has a positive impact on supply chain finance

2.4. Financial institutions and supply chain finance

Financial institutions are vital to supply chain operations, handling payment collection and risk assessment for manufacturing companies (Nguema et al., 2020). They also enhance supply chain efficiency by reducing negative cost shifts and improving visibility, availability, delivery, and cash flow for all participants (Lamoureux & Evans, 2012).

According to Zhang (2015), the role of financial intermediaries is captured in three factors: supportive attitude, organizational structure, and hedging. Empirical studies show that factoring services provided by financial institutions have improved SME efficiency (Hofmann, 2021). These institutions effectively assess credit risks using a six-step approach (Zhao et al., 2018). Additionally, Gornall & Strebulaev (2018) proposed a capital structure suited to supply chain operations. Based on this, the following hypothesis is proposed:

Hypothesis H4. The role of financial institutions has a positive impact on supply chain finance

2.5. Digitizing technologies and supply chain finance

Supply chain operations benefit significantly from advancements in science and technology (Nguema et al., 2020). Digital technology provides businesses with a competitive edge as their operations and distribution expand geographically (Ali et al., 2020). It also supports forecasting, planning, sales invoicing, and data synchronization within supply chain systems (Kamble et al., 2020).

The ability to digitize is evaluated through three factors: applying digitalization to attract buyers, staff training, and fostering relationships within the supply chain (Nguema et al., 2020). Technologies like Big Data and the Internet of Things enable accurate decision-making, minimize errors, and reduce risks (Kamble et al., 2020). Additionally, digital tools improve order tracking, reduce paperwork costs, and enhance transparency (Fairchild, 2005). However, the high cost of digitization poses challenges for SMEs. Based on this, the following research hypothesis is proposed:

Hypothesis H5. Digitizing technologies have a positive impact on supply chain finance

2.6. External environment and supply chain finance

The operations of economic organizations are influenced by macroeconomic factors (Kamble et al., 2020). During the appraisal of supply chain enterprises, macro variables are key considerations (Gornall & Strebulaev, 2018), significantly affecting investment, financing, and trade promotion (Ali et al., 2020).

Zhang's (2015) research highlights the role of governing body regulations in shaping enterprise operations. The COVID-19 pandemic, for instance, had a profound impact on retail supply activities (Li et al., 2023). To assess the external environment, Zhang (2015) identified three factors: the impact of macroeconomic conditions, regulatory influence, and advancements in financial technology.

Hypothesis H6. The external environment has a positive impact on supply chain finance

2.7. Information sharing and supply chain finance

Information sharing enhances mutual understanding among businesses. According to the theory of information asymmetry, it helps supply chain actors make informed decisions, reducing issues like adverse selection and moral hazard (Auronen, 2003). Information sharing is evaluated using three factors: the extent of sharing with stakeholders, the benefits gained, and its overall effectiveness.

Research shows that effective information sharing has improved access to finance for SMEs in China (Nguema et al., 2020), as it contributes to better business performance. Based on this, the following research hypothesis is proposed:

Hypothesis H7. Information sharing has a positive impact on supply chain finance

2.8. The intermediary role of supply chain finance

Enhancing supply chain efficiency is a significant challenge for businesses. Positive internal factors like collaboration, negotiation, information sharing, and digitization increase access to finance, thereby improving supply chain performance (Liebl et al., 2016). Favorable macroeconomic conditions also support business growth, capital expansion, and better debt repayment (Zhang, 2015; Li et al., 2023).

Financial institutions are a key source of capital for businesses (Gornall & Strebulaev, 2018), improving access to funding and boosting supply

chain efficiency (Gelsomino et al., 2014; Nguema et al., 2020; Mulchandani et al., 2023). Empirical studies in China confirm the critical and intermediary role of supply chain finance (Ali et al., 2020; Mulchandani et al., 2023). Based on this, the following research hypothesis is proposed:

Hypothesis H8. Supply chain finance plays an intermediary role in the impact of the external environment on supply chain effectiveness

Hypothesis H9. Supply chain finance plays an intermediary role in the impact of collaboration on supply chain effectiveness

Hypothesis H10. Supply chain finance plays an intermediary role in the impact of negotiation on supply chain effectiveness

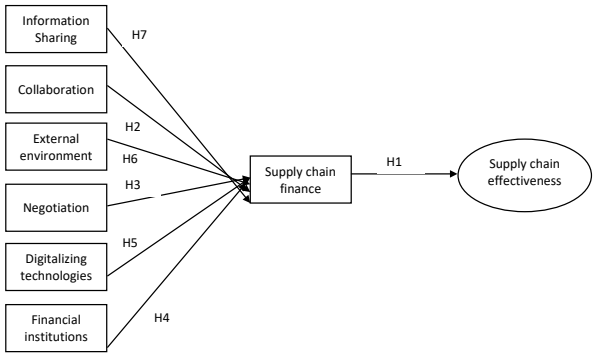
Hypothesis H11. supply chain finance plays an intermediary role in the impact of digitalizing technologies on supply chain effectiveness

Hypothesis H12. supply chain finance has a mediating role in the impact of financial institutions on supply chain effectiveness

Hypothesis H13. supply chain finance has a mediating role in the impact of information sharing on supply chain effectiveness

Based on the study of Ali et al. (2020) and Mulchandani et al. (2023), the author proposes a research model as Figure 1.

Figure 1. Proposed research model



3. Methodology

3.1. Research methods

The research process was carried out in two steps. First, the article reviews related previous studies to propose a model of the impact of digitization on supply chain effectiveness under the mediated influence of supply chain finance. Then, six factors have an impact on supply chain finance, including the External Environment, collaboration, negotiation, information sharing, financial institutions, and Digitizing technologies. Finally, the article used quantitative research methods and conducted a direct survey using Google Forms to get data.

3.2. Research data

The article uses Google Forms to collect answers from employees and managers who are working at retail businesses in Ho Chi Minh City. The survey was collected during 5 days from 05/05/2023 to 05/06/2023. The data was then filtered, and 344 valid responses were retained. In the questionnaire, a 5-point Likert scale was used, with the lowest level being disagreed, and the highest level being completely agreed. This scale is used due to its user-friendliness, time-saving, and suitability as a research model.

3.3. Data analysis

Model using partial least squares structural equation (PLS-SEM) and bootstrapping, processed by SmartPLS 4.0 software. The analysis process goes through two stages, including measurement model evaluation and structural model evaluation.

4. Research results

4.1. Statistical description

The responses collected from 344 people showed that men accounted for 52%, while women accounted for 48%. Furthermore, nearly 50% of respondents are between the ages of 25 and 45. The number of people between the ages of 16 and 25 accounts for 31%. In addition, the results of the data description also show that the proportion of respondents in the sample is 45% professionals and 55% leaders. More than half of the businesses surveyed are small businesses.

4.2. Evaluation of the measurement model

The results of the model evaluation are shown in Table 1, showing that all the model evaluation criteria give positive results. This indicates that all the resulting measurement models have satisfactory stability and accuracy.

Table 1. Results of measurement model evaluation

Latent variable	Items	Convergent validity			Internal consistency reliability	
		Outer Loadings	Composite Reliability - rho_a	AVE	Composite Reliability - CR	Cronbach's Alpha
		>0.70	>0.50	>0.50	0.60 - 0.90	0.60 - 0.90
SCFN	SCFN1	0.803	0.870	0.584	0.875	0.822
	SCFN2	0.710				
	SCFN3	0.717				
	SCFN4	0.783				
	SCFN5	0.801				
SCEN	SCEN1	0.819	0.831	0.704	0.905	0.861
	SCEN2	0.892				
	SCEN3	0.805				
	SCEN4	0.838				
NEGO	NEGO1	0.875	0.830	0.741	0.896	0.826
	NEGO2	0.861				
	NEGO3	0.847				

Latent variable	Items	Convergent validity			Internal consistency reliability	
		Outer Loadings	Composite Reliability - rho_a	AVE	Composite Reliability - CR	Cronbach's Alpha
		>0.70	>0.50	>0.50	0.60 - 0.90	0.60 - 0.90
COLA	COLA1	0.784	0.786	0.590	0.852	0.771
	COLA2	0.723				
	COLA3	0.820				
	COLA4	0.743				
DIGI	DIGI1	0.879	0.760	0.701	0.875	0.788
	DIGI2	0.860				
	DIGI3	0.769				
FINA	FINA1	0.810	0.772	0.694	0.872	0.781
	FINA2	0.850				
	FINA3	0.839				
ENVI	ENVI1	0.830	0.788	0.683	0.866	0.768
	ENVI2	0.794				
	ENVI3	0.827				
INFO	INFO1	0.838	0.788	0.668	0.858	0.753
	INFO2	0.792				
	INFO3	0.849				

Source: SmartPLS 4.0 analysis results

According to Sarstedt et al. (2022), the reliability and value of each item must be evaluated, as well as the outer loading coefficient; the threshold value must be at least 0.7. In addition, Cronbach's Alpha value must be between 0.6 and 0.9. Thus, the results in Table 1 all meet the requirements. The AVE values are all greater than 0.5, giving the structural detail that explains more than half of its item variation (Table 1). Therefore, the converging value of the structure is established. To evaluate the discriminant validity of the model, the heterotrait-monotrait ratio of correlations (HTMT) was calculated, with all items meeting the required threshold (Table 2).

Table 2. The results of the heterotrait-monotrait ratio of correlations

	COLA	DIGI	ENVI	FINA	INFO	NEGO	SCEF
COLA							
DIGI	0.636						
ENVI	0.744	0.734					
FINA	0.646	0.724	0.795				
INFO	0.674	0.675	0.781	0.707			
NEGO	0.726	0.675	0.840	0.679	0.755		
SCEF	0.444	0.477	0.642	0.512	0.630	0.737	
SCFN	0.769	0.762	0.729	0.841	0.761	0.814	0.580

Source: SmartPLS 4.0 analysis results

4.3. Structural model evaluation

The structural model is evaluated by calculating the degree of difference between the dependent variables. In which, the path coefficient and the coefficient of determination R^2 are used. The path coefficient shows how well the independent variable explains the dependent variable. The coefficient R^2 represents the variation of the independent variable for the variance of the other variable.

The evaluation results show that the R^2 of supply chain effectiveness is 0.525. This shows that the explanatory level of the model is moderate (Hair et al., 2017). The highest VIF coefficient of the variables in the research model is 2.79, the model has insignificant multicollinearity (Hair et al., 2012).

Table 3. Hypothesis test results

Hypothesis		Original sample (O)	Sample mean (M)	Standard deviation (STDEV)	T statistics (|O/STDEV|)	P values
Indirect effects						
H9	COLA -> SCEF	0.160	0.160	0.024	6.739	0.000
H11	DIGI -> SCEF	0.141	0.142	0.025	1.617	0.006
H8	ENVI -> SCEF	0.106	0.106	0.029	3.607	0.000
H12	FINA -> SCEF	0.090	0.092	0.023	3.897	0.000
H7	INFO -> SCEF	0.087	0.087	0.024	3.660	0.000
H10	NEGO -> SCEF	0.048	0.050	0.029	1.686	0.092
Total effects						
H2	COLA -> SCFN	0.318	0.319	0.047	6.791	0.000
H5	DIGI -> SCFN	0.181	0.182	0.049	1.657	0.008
H6	ENVI -> SCFN	0.212	0.209	0.054	3.899	0.000
H4	FINA -> SCFN	0.180	0.182	0.042	4.249	0.000
H7	INFO -> SCFN	0.174	0.172	0.046	3.805	0.000
H3	NEGO -> SCFN	0.096	0.098	0.054	1.782	0.075
H1	SCFN -> SCEF	0.502	0.504	0.045	11.269	0.000

Source: SmartPLS 4.0 analysis results

The results of the path analysis show that H3 and H10 are rejected. All other hypotheses are accepted, these paths between the independent and dependent variables are statistically significant. As for the direct effect, hypothesis H2 shows that the impact of cooperation on supply chain finance is positive and significant ($\beta = 0.318$ and $p = 0.000$). Hypothesis H6 shows that the impact of the External Environment on supply chain finance is positive and significant ($\beta = 0.212$ and $p = 0.000$). Hypothesis H4 shows that the impact of financial institutions on supply chain finance is positive and significant ($\beta = 0.180$ and $p = 0.000$). Hypothesis H7 shows that the effect of information sharing on supply chain finance is positive and significant ($\beta = 0.174$ and $p = 0.000$). Hypothesis H1 shows that the influence of supply chain finance on supply chain effectiveness is significant and positive ($\beta = 0.502$ and $p = 0.0000$). Hypothesis H5 implies that the impact of digitalization on supply chain finance is positive and significant ($\beta = 0.181$ and $p = 0.008$) (Table 3).

According to the findings, hypothesis H9 describes the mediating effect of supply chain finance on the relationship between cooperation and supply chain effectiveness. The results showed a strong and positive mediating role ($\beta = 0.160$ and $p = 0.0000$). Hypothesis H8 suggests a mediating effect of supply chain finance on the relationship between the External Environment and supply chain effectiveness. The results showed a strong and positive mediating role ($\beta = 0.106$ and $p = 0.0000$). Hypothesis H12 shows the mediating effect of supply chain finance on the relationship between financial institutions and supply chain effectiveness. The results confirmed this effect to be in the same direction and statistically significant ($\beta = 0.090$ and

p = 0.000). Hypothesis H7 implies a mediating effect of supply chain finance on the relationship between information sharing and supply chain effectiveness. Research results have also shown that this influence is positive and strong (β = 0.087 and p = 0.000). Hypothesis H11 is also confirmed, showing the mediating effect of supply chain finance on the relationship between Digitizing technologies and supply chain effectiveness (β = 0.141 and p = 0.006).

The results reveal four unsupported hypotheses, highlighting differences between findings in Vietnam and those in China. Among Vietnamese SMEs, collaboration does not significantly impact supply chain finance, nor is its indirect influence confirmed. The remaining factors, however, show positive and significant effects, aligning with the studies of Ali et al. (2020) and Mulchandani et al. (2023). These findings suggest that supply chain finance enhances the efficiency of SMEs in Vietnam's retail supply chain. Key factors influencing supply chain finance include the external environment, negotiation, digitization, information sharing, and financial institutions. Additionally, supply chain finance mediates supply chain effectiveness (Table 3).

The study underscores that when collaboration, a favorable external environment, negotiation, and digitization are effectively implemented, financial institutions provide robust support, improving access to finance. Consequently, businesses achieve greater supply chain effectiveness. Financial support significantly boosts outcomes, as shown by the highest impact coefficient among direct effects. Collaboration emerges as the most influential factor, as effective cooperation within the supply chain resolves issues and benefits both sides, facilitating access to finance. The external environment ranks second, as favorable macroeconomic conditions enhance business operations and debt repayment, easing the process of raising capital.

5. Conclusion

Research indicates that factors such as the external environment, negotiation, digitization, information sharing, and financial institutions positively impact supply chain finance. Among these, collaboration and the external environment are the most influential. Enhanced supply chain finance, in turn, promotes supply chain effectiveness. Based on this, governments and retail businesses should focus on implementing digitization processes.

However, the model has limitations as it evaluates from the perspective of businesses while neglecting consumer viewpoints. Additionally, it does not account for the time factor, as responses may vary over time. These limitations present opportunities for future research to address and refine the model further.

References:

Ali, Z., Gongbing, B., & Mehreen, A. (2020). Does supply chain finance improve SMEs performance? The moderating role of trade digitization. Business Process Management Journal, 26(1), 150-167. https://doi.org/10.1108/BPMJ-05-2018-0133

Auronen, L. (2003). Asymmetric information: theory and applications. Seminar of Strategy and International Business at ..., 1-35. http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.198.9252&rep=rep1&type=pdf

Basu, D. M., & Preetam. (2013). A detailed study and a hierarchical model based on the experiences of an Indian firm Dileep. Business Process Management Journal, 19(4), 624-647.

Bui, D. L., & Nguyen, T. D. H. (2023). Factors influencing the decision to outsource logistics services of small- and medium-sized enterprises in Vietnam. Journal of International Economics and Management, 23(1), 106-118. https://doi.org/10.38203/jiem.023.1.0064

Capaldo, A., & Giannoccaro, I. (2015). How does trust affect performance in the supply chain? the moderating role of interdependence. International Journal of Production Economics, 166, 36-49. https://doi.org/10.1016/j.ijpe.2015.04.008

Carnevale, P. J. D., & Isen, A. M. (1986). The influence of positive affect and visual access on the discovery of integrative solutions in bilateral negotiation. Organizational Behavior and Human Decision Processes, 37(1), 1-13. https://doi.org/10.1016/0749-5978(86)90041-5

Dubey, R., Altay, N., Gunasekaran, A., Blome, C., Papadopoulos, T., & Childe, S. J. (2018). Supply chain agility, adaptability and alignment: Empirical evidence from the Indian auto components industry. International Journal of Operations and Production Management, 38(1), 129-148. https://doi.org/10.1108/IJOPM-04-2016-0173

Fairchild, A. (2005). Intelligent matching: Integrating efficiencies in the financial supply chain. Supply Chain Management, 10(4), 244-248. https://doi.org/10.1108/13598540510612703

Fugate, B. S., Stank, T. P., & Mentzer, J. T. (2009). Linking improved knowledge management to operational and organizational performance. Journal of Operations Management, 27(3), 247-264. https://doi.org/10.1016/j.jom.2008.09.003

Gelsomino, L. M., Mangiaracina, R., Perego, A., & Tumino, A. (2014). Supply chain finance: a literature review. Journal of Physical Distribution & Logistics Management, 46(4).

Gornall, W., & Strebulaev, I. A. (2018). Financing as a supply chain: The capital structure of banks and borrower. Journal of Financial Economics, 129(3), 510-530.

Hofmann, E. (2021). Supply Chain Finance. International Encyclopedia of Transportation: Volume 1-7, 3, 113-118. https://doi.org/10.1016/B978-0-08-102671-7.10229-5

Janda, S., & Seshadri, S. (2001). The influence of purchasing strategies on performance. Journal of Business and Industrial Marketing, 16(4), 294-308. https://doi.org/10.1108/EUM0000000005502

Kamble, S. S., Gunasekaran, A., & Gawankar, S. A. (2020). Achieving sustainable performance in a data-driven agriculture supply chain: A review for research and applications. International Journal of Production Economics, 219(July 2018), 179-194. https://doi.org/10.1016/j.ijpe.2019.05.022

Lamoureux, J. F., & Evans, T. A. (2012). Supply Chain Finance: A New Means to Support the Competitiveness and Resilience of Global Value Chains. SSRN Electronic Journal, 289-312. https://doi.org/10.2139/ssrn.2179944

Li, D., Han, D., Crespi, N., Minerva, R., & Li, K. C. (2023). A blockchain-based secure storage and access control scheme for supply chain finance. Journal of Supercomputing, 79(1), 109-138. https://doi.org/10.1007/s11227-022-04655-5

Liebl, J., Hartmann, E., & Feisel, E. (2016). Reverse factoring in the supply chain: objectives, antecedents and implementation barriers. Nternational Journal of Physical Distribution & Logistics Management, 46(4).

Mulchandani, K., Jasrotia, S. S., & Mulchandani, K. (2023). Determining supply chain effectiveness for Indian MSMEs: A structural equation modelling approach. Asia Pacific Management Review, 28(2), 90-98.

Nguema, B. B., Noël, J., Bi, G., Ali, Z., Mehreen, A., Rukundo, C., & Ke, Y. (2020). Exploring the factors influencing the adoption of supply chain finance in supply chain effectiveness: evidence from manufacturing firms. Journal of Business and Industrial Marketing, 36(5), 706-716. https://doi.org/10.1108/JBIM-01-2020-0047

Pfohl, H. C., & Gomm, M. (2009). Supply chain finance: Optimizing financial flows in supply chains. Logistics Research, 1(3-4), 149-161. https://doi.org/10.1007/s12159-009-0020-y

Powell, W. W., Koput, K. W., Smith-Doerr, & Laurel. (1996). Interorganizational collaboration and the locus of innovation: Networks of learning in biotechnology. Administrative Science Quarterly, 116-145.

Sarstedt, M., Hair, J. F., Pick, M., Liengaard, B. D., Radomir, L., & Ringle, C. M. (2022). Progress in partial least squares structural equation modeling use in marketing research in the last decade. Psychology and Marketing, 39(5), 1035-1064. https://doi.org/10.1002/mar.21640

Simatupang, T. M., & Sridharan, R. (2005). The collaboration index: A measure for supply chain collaboration. International Journal of Physical Distribution and Logistics Management, 35(1), 44-62. https://doi.org/10.1108/09600030510577421

Thi Ngoc Bich, L., Bao Tram, H., Quang Hung, D., Marchesani, F., & Quang Tuan, B. (2022). Firm innovation strategies and integration into the global value chains: how does the local business environment matter? Journal of International Economics and Management, 22(3), 62-90. https://doi.org/10.38203/jiem.022.3.0054

Zhang, R. (2015). The Research on Influence Facts of Supply Chain Finance Operation. Proceedings of the 2015 International Conference on Management Engineering and Management Innovation, 3(Icmemi), 88-92. https://doi.org/10.2991/icmemi-15.2015.17

Zhao, H., Liu, Q., Zhu, H., Ge, Y., Chen, E., Zhu, Y., & Du, J. (2018). A sequential approach to market state modeling and analysis in online P2P lending. IEEE Transactions on Systems, Man, and Cybernetics: Systems, 48(1), 21-33. https://doi.org/10.1109/TSMC.2017.2665038