

Realization of Human Resource Management Activity on Supply Chain Management for Sustainable Business Development

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ARTICLE INFO	ABSTRACT
Received: 12 Nov 2024	Introduction: Even though most commercial firms maintain their reputations and deliberately handling the supply chains. Appearing in the similar time, HR practitioners partake reputable performs and procedures that progress employee and organizational performance. In transitory, in cooperation with Human resource management(HRM) and Supply chain management(SCM) have deficient performance. Further, hypothetically talented perceptions on management of persons in supply chains is very essential. Objectives: This study focus about the interface parameters among SCM performs together with and supply chain(SC) presentation, incorporating intensity of competition as a moderator towards better understanding of this relationship. Methods: For this work, Hypotheses testing, independent t-tests were applied to estimate mean value and SD(standard deviation) of items privileged the independent variable and a-few mediators. Results: The results assess the direct connections among the constructs detailed in the above table. The results demonstrate the relationship scrutinized on analytical grounds, the formed hypothesis observed at the outset, which examines the effect of practices in HRM along with SCM and performance of supply chain, which includes supply chain effectiveness and viability of supply chain. Conclusions: This research asserts that HRM practices and supply chain recital have a significant protagonist in increasing and optimizing supply chain effectiveness and efficiency. Keywords: Competition, performance, supply chain, Human resource, intensity
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1.INTRODUCTION

The possibility of HRM is identically large and all major goings-on in the employed lifecycle of a worker. It means, beginning the period of men his women entry till their leaves the organisation derives beneath the horizon of HRM. Human resource management partakes four aims such as societal, functional, personal and organizational development. The increased level of competition has highlighted the reputation of effective Human Resource Management (HRM) and pushed researchers to investigate evolutionary variations from traditional HRM practices, such as developing a framework for evolutionary HRM practices, introducing an economic evolutionary perspective, and meshing various national and international HRM standards. With the goal of staying globally competitive, New Human Resource Practices (NHRM) must be formulated. The more extreme the competition becomes, the higher the demands of consumers will be, and the quicker they will recognize and buy quality goods and services. Moreover, with the rise of environmental concerns, consumer interest in sustainable and eco-friendly products is surging. In highly competitive marketplaces, product homogenization is very

prominent, and clients have more pricing, product, service, and reputation choices. Customers prefer to do business with companies that have an efficient supply chain and logistics system. Therefore, SCM, which not only cuts back on business related hazards to the environment but also is responsive to the demands of customers, has a direct effect on economic performance. Fareed MZ, and Su Q, Li MS(2022), has sustained that the effect of successful SCM procedures on economic output is stronger in a stronger competitive atmosphere when compared to weaker competitive ones. Supply chain management (SCM) has gained traction in the past period as numerous study documents have been released in an effort to better understand its effects on , organizational, operational and supply chain entertainment (Yu et al.,2022). But, a few mainstream of the results from these studies have been based on rural and urban businesses organizations located in developed countries. Such organisations or Companies positioned in emerging countries partake a considerable greater task when annoying to progress their procedures, counting their HRM and SCM practices, to endure competitive spirit in the up-to-date scenery. Competition has exponentially grown over the last two decades due to sources for example free trade agreements, globalization, and open markets.

SCM (Supply Chain Management) is a system that expediences a network, that vintage fresh ingredients, transmute them hooked on intermediate goods and at that moment final goods, and transport the goods to customers over a distribution system (Sundram VPK ,2010). Implementation of SCM (Supply chain management) executes in businesses and manufacturing has progressively improved subsequently in the year the 1980s and a number of explanations are projected besides the idea is deliberated from countless perceptions. Singh V, Kumar A, Singh T(2018), Piprani AZ, Mohezar S, Jaafar NI,2020), providing excellent analysis on supply chain management. This paper express the development of SCM and disparagingly assessed the developments in the model and training of supply management.

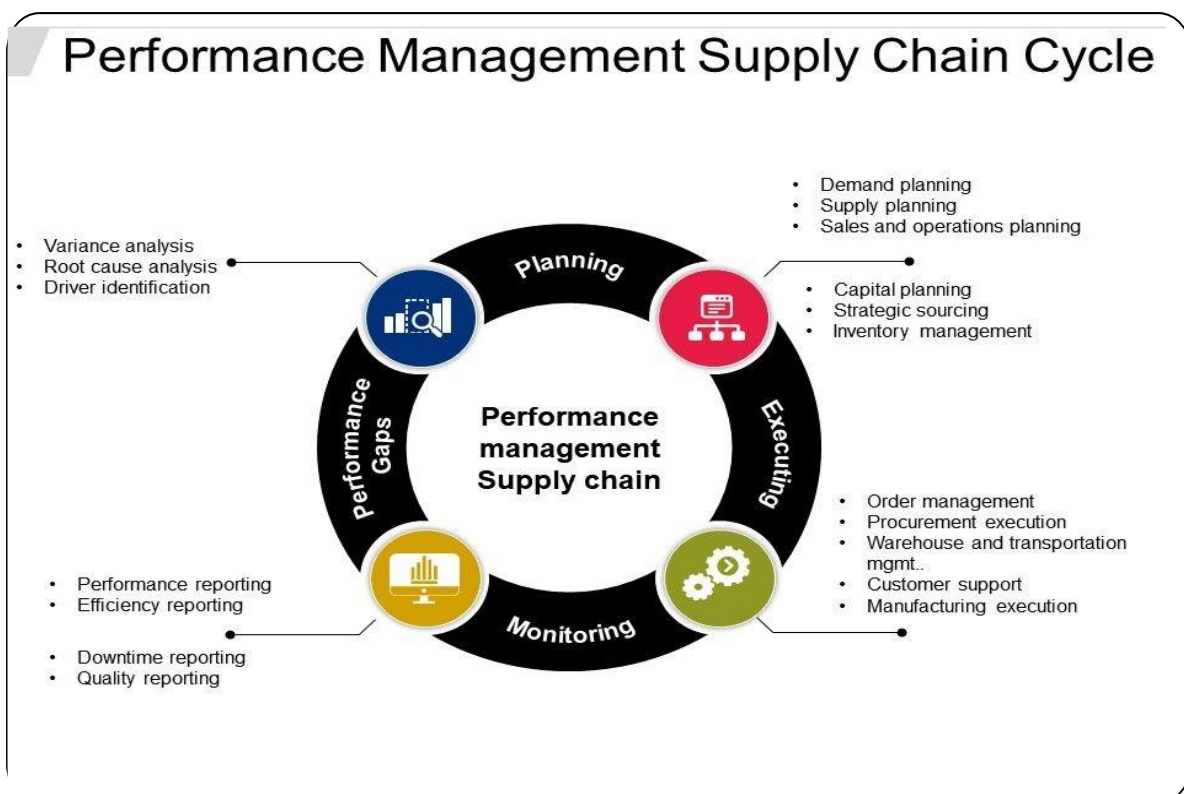


Figure 1. Performance integrated supply chain management

2.OBJECTIVES

The framework demonstrates how Human Resource Management (HRM) procedures together with effective SCM (Supply Chain Management) can influence SC (Supply Chain) procedures. It assesses two resultant variables in footings of SC competence and SC efficiency. . To afford a added precise analysis amongst SCM performs next in order to Supply chain concert, in a particular one inspiration about competing intensity is likely watered-down between every self-governing and output variable quantity.

3.METHODS

To afford a added precise analysis amongst SCM performs next in order to Supply chain concert, in a particular one inspiration about competing intensity is likely watered-down between every self-governing and output variable quantity. For this work, Hypotheses testing, independent t-tests were applied to estimate mean value and SD(standard deviation) of items privileged the independent variable and a-few mediators were implemented. The overall methods used inthis study were explained in Figure 2.

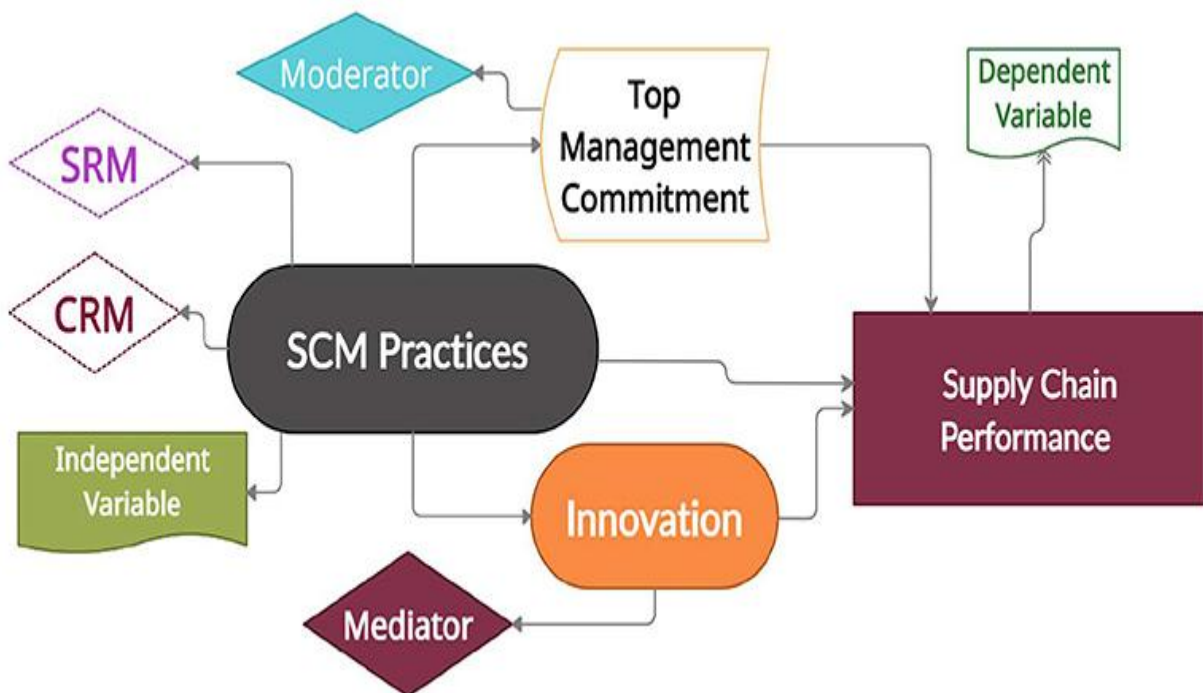


Figure 2. Intangible Research Method and Study parameters

4.RESULTS

4.1.Hypotheses testing

H1--The practice of Human Resource Management coincide with considerable effect on SCM (Supply Chain Management) and the output variable, SC (Supply Chain) recital.

H2- The (SCM) Supply Chain Management moderates the fitting together flanked by Human Resource Management execution including some output input variants, and SC Performance.

H3- Competing Intensity moderates the rapport among HRM, SCM and SCP (Supply Chain) performance).

H4- There is an extensive model fit flanked by HRM practices, SCM, Competitive Intensity, and Supply Chain Performance.

4.2.Data inspection and elucidation

In order to guarantee the rationality along with dependability of our level scales, the investigation was adapted from several commonly referenced past working out (Rohana et al.,2019). Apiece stretchy of our dependent variables and independent were calculated using a single multi-item scale. The queries were responded on Likert 5-point Scale, it vacillating in distinction to sturdily discordant 1 point to stalwartly agreeing 5 points. To evaluate the consistency of our range scales, we castoff factor analysis and principal component analysis to categorize aspects and confirm so that everyone query in a measure recorded so as single factor through an eigenvalue of a matrix greater than 1 and queries that presented a part lading of not as much of 0.40 value be located or omitted from added evaluation. The score of Cronbach alpha was pragmatic through analyse a few constancy about the measure scales. Altogether scales of our erudition attained the recommended standard of $\alpha \geq 0.70$, that all are determinedly reliable by previous study (Sundram et al.,2020).

4.3.CFA

A confirmation aspect investigation were steered along to the line of estimation and construct a particular one cogency. The statistical packages AMOS were worked for the investigation of independent, mediating, and outcome variables. The CFA comprised of 14 items that were superfluous to measure variables such as trust, commitment, citizenship, social network, training, teamwork, incentive, HR planning, performance evaluation, and job security, as well as mediating variables like information sharing, supplier integrity, an advanced planning system, and supply and distribution network structure. By directive facing measure of the goodness fit for a few measurement prototypical results, several goodness of fit (GOF) measure were used, specifically the fraction of chi square statistics ahead of the CMIN/Df = 4.507, the G.F.I = 0.876, the A.G.F.I (Adjusted goodness of fit index) = 0.902, N.F.I the normed fit index = 0.795, the C.F.I,comparative fit index = 0. 0.831, and the R.M.S.E.A, root mean square error of approximation = 0.009. Some studies conducted by Tukamuhabwa et al.,(2021), gives relevant outcomes. Looking at the results shown in the tables, it is clear that the CFA had a definite good fit model amongst the experiential and disregarded variables. Therefore, the recommended model can be well-thought-out as a good fit.

The CFA was made up of three components that were used to evaluate variables that included sub-variables about competitiveness intensity and performance of SC(supply chain).Some goodness of fit (GOF) measurements be located and used towards test the measurement quality of the model result. These measurements were the Chi-square statistic ratio delving degrees of freedom (C.M.I.N/Df) = 2.118, the G.F.I- goodness of fit index = 0.908, A.G.F.I- adjusted goodness of fit index = 0.833, N.F.I- normed fit index = 0.839, C.F.I- comparative fit index = 0.814, and R.M.S.E.A - Root Mean Square Error of Approximation = 0.021. This data indicated that the moderating variable had a strong impact fitting together within the independent and dependent variables (Hashim et al.,2020). A few grouping results proposed, that the CFA was an identical good fit model among the observed and not-observed variables. Consequently, the obtainable model is a great fit.

4.4.T-test

For this work, independent t-tests were applied to estimate mean value and SD(standard deviation) of items privileged the independent variable and a-few mediators. To that place, there is a determined and positive correlation within the independent variables, mediating variable and moderator with the product variable when taking into account their mean and standard deviation. This hypothesis grasps true in the meantime the calculated t-values (5.695, 7.394, and 6.294) for the three variables exceed their respective p-values at the 5% level of significance, representing a significant variance amongst overall human resource practices, SCM (supply chain management), and the outcome variable. Furthermore, it authorizes that advanced practice of SCM. will be a positiveness consequence via supply chain performance. Besides, it can be understood from the table that, nevertheless competitive intensity does not have a direct effect on the output variable, it does has a significant influence on supply chain efficiency and effectiveness, with corresponding mean values of 29.47 and 25.55 and standard deviations of 2.14 and 2.48, respectively. Moreover, the hypothesis clasps true when looking for at the

t-values (5.695, 7.394, and 6.294) being greater than the p-values, inferring that supply chain management with effective HRM performances will hold a strong correlation with the result.

4.5 .Regression

Hierarchical multiple regression analysis is utilized to test a hypothesis. It follows a four-step procedure, where a moderator is added in the second step. The following is the test procedure:

Table 1
The consequence HRM and SCM with moderators

Model	Unstandardized Coefficient		Standardized Coefficients Beta (β)
	Beta (β)	S.E	
Trust	0.375	0.097	0.052
Commitment	0.286	0.031	0.062
Citizenship	0.220	0.011	0.018
Social network	0.222	0.053	0.061
Training	0.117	0.010	0.009
Team work	0.472	0.076	0.017
Incentive	0.420	0.083	0.018
HR planning	0.285	0.023	0.082
Performance evaluation	0.204	0.039	0.077
Job security	0.186	0.044	0.075

p<.05; p<.01;p<.001 value clarify the Dependent Variable and HRM practices

The results showed in Table- 1, précises of hierarchical regression for the dependent variable of green SCM practice and independent variable of innovativeness scale. The model of value was 132.67, the level of significance was 0.001, and regression equation was found to be significant; the value R was 0.601, signifying the enterprise scale.

First, SCM practices were included to analyse their effect on SC performance, including SC efficiency and hypotheses. Next, moderator variable, and competitive intensity engaged were placed in account. After that, the contacts among the competitive intensity and separate SCM practice were analysed prior to calculating the interaction terms. In directive to decrease probable multicollinearity, independent variables, SCM practices, and variable of moderator, competitive intensity, were mean-centred. To guarantee that multicollinearity could not change the regression analysis results. Here, VIF (variance inflation factor) analytical technique have been utilized. The value standards in VIF indicated in order of multicollinearity could not disturb the regression model result out come. Every outcomes from the initial regression model demonstrated that Supply chain management practices as a whole had a markedly positive effect on the elucidation for the SC efficiency variance outcome as $R^2_{adj} = 0.734$, $P < 0.01$. In relation to separate S.C.M performs, they were suggestively and favourably associated to supply chain efficiency. A-few social networks had a noteworthy, yet negative, effect on Supply chain efficiency, and incentives had an insignificant effect. Additionally, the results revealed a significant yet undesirable regulating result of competing intensity association between social networks and Supply chain{SC} efficiency, which supported H_{3c} . Despite this, the hypothesis over there not backed up, as the outcomes indicated no moderating effects of competitive intensity on the relationship. This research was designed to examine the impact of S.C.M convenance on supply chain success and Supply chain effectiveness while taking into account the controlling effect of competing intensity, and it has proven a noteworthy and positive relationship between the variables.

4.6. Moderated mediation analysis

The incorporation of moderator investigates has been a long-lasting practice in the field of psychology, usually denoted to as an interface outcome in the analysis of variance. A moderator effect is once the effect of single predictor is altered by a second predictor. In order to comprehend the affinity amongst the diverse variables, it is needed to trust both approaches. In management analysts (Al-Harazneh and Sila, 2021) introduced the term "moderated mediation" to designate when a moderator is supplemented to a mediation model, though there are frequent ways wherein a moderator can have an outcome on a arbitrating relationship. Additionally, these four conditions were tested to assess the moderating mediated effect: (1) Therein a confident (positive correlation) within HRM practices along with SC(supply chain) performance; (2) To that a positive helpful correlation within Human resource management procedures and competition that predicts SCM (3) To such an extent is a positive relation between SCM and performance of supply chain and (4) supply chain management indirectly affects supply chain performance through HRM practices in both low and high levels of competition.

With step 1 for moderation mediation, the hypothesis results indicated that HRM had a positive impact situated on supply chain perfectness, such as efficiency of supply chain and effectiveness of supply chain. The controlling regressions provided evidence that the connection between HRM and competitive intensity was significant in the supply chain management direction. Furthermore, results from this hypothesis confirmed that, Supply chain management shown a noteworthy effect on supply chain perfectness, the overall research results of entire three conditions verify that competitive intensity moderates the mediation of SCM between HRM and performances of supply chain. By moderated mediation results of current investigation, as suggested by Preacher, Rucker, and Hayes, were also validated at both a lower and higher degree of competitive intensity. Results specified in order for HRM practices based indirect effects might be very significant within a higher competitive intensity level with I.E(Indirect effect) = 0.059, S.E = 0.021, $p < 0.01$ rather than in the low competitive intensity condition (indirect effect = 0.043, S.E(Standard error) = 0.05, $p < 0.01$).

The results of the hypothesis were supported by the condition.re positively correlated; (2) SCM and the level of competition that predicts supply chain management are positively correlated; (3) supply chain management and supply chain performance are positively correlated; and (4) supply chain management indirectly influences supply chain perfectness through HRM practices in both low and high levels of competition. The results of step 1 for moderation mediation supported the premise that HRM improved performing in supply chain, including effective supply chain workout. The moderating regressions demonstrated that the substantial relation within SCM and competitive intensity, as indicated in the above table. This was further supported by the hypothesis's findings. The research findings of all three situations confirm that competitive intensity moderates the arbitration of SCM between HRM and supply chain performance, since SCM was proved to have a major impact on better performance in supply chain. As proposed by Kagoya and Bamba(2020), the moderated mediation findings of this study were also validated to a lower and higher degree. Table 2, results directed that the HRM performance related indirect effects can be significant very high with a high degree of competitive intensity (indirect effect = 0.059, SE = 0.021, $p < 0.01$) rather than in the low competitive intensity condition (I.E(indirect effect) = 0.043, S.E = 0.05, $p < 0.01$). Expected outcome of the hypothesis were buoyed by the performance level.

4.7..Structural equation modelling

The last phase of analysing this study concentrates on constructing a fresh composite research model through structural equation modelling.

Table 2: The structural Fit model

Model Indexes	χ^2	Df	χ^2 / df	G.F.I	C.F.I	A.G.F .I	R.M. R	R.M.S.E. A	N.F.I
	42.96	12	3.580	0.887	0.721	0.802	0.398	0.019	0.826

This part of the study aims to assess the direct connections among the constructs detailed in the above table. The results demonstrate the relationship scrutinized on analytical grounds, the formed hypothesis observed at the outset, which examines the effect of practices in HRM along with SCM and performance of supply chain, which includes supply chain effectiveness and viability of supply chain. The outcomes of HRM practices on the other variables demonstrate that $\beta(0.82)$, $p < 0.01$; $\beta(0.50)$, $p < 0.01$; $\beta(0.73)$, $p < 0.01$; $\beta(0.85)$, $p < 0.01$; $\beta(0.54)$, $p < 0.01$; $\beta(0.77)$, $p < 0.01$; $\beta(0.56)$, $p < 0.01$; $\beta(0.49)$, $p < 0.01$; $\beta(0.76)$, $p < 0.01$ and the associated self-esteem was discovered to be accurate, and thus the hypothesis was recognized on measurable grounds. In the second investigated hypothesis, the association among management of supply chain and performances in supply chain with subsequent beta qualities greater than 1.96, the cut-off point, in order to establish the relationship on factual meadows. The hypothesis third examines the relationship amongst the mediator, i.e., serious force, and supply chain execution. The logical outcomes show separate beta values, while t-esteem is more prominent than the cut-off point of 1.96. Consequently, the hypothesis is acknowledged on measurable grounds. On the other hand, the consequences of a roundabout impact have been assessed. The findings of which strengthen the previous investigation's directed intercession impact.

5.DISCUSSION

In rural and urban region, today as well as in the coming days, SCM will become increasingly important to customers. This research asserts that HRM practices and supply chain recital have a significant protagonist in increasing and optimizing supply chain effectiveness and efficiency. At first, it was suggested that HRM may largely influence the different components of HRM performs associated with the supply chain. The outcomes of the hierarchical regression analysis suggested that the impact of competitive intensity restrained the linking between HRM practices and supply chain performance. The probable rationalization for the remarkable outcome is likely due to more advanced HRM practices that prioritize traditional and modern administrative tasks such as offering bonuses, incentives, appraisals, and promotions as part of human resources management. Further, they place a greater emphasis on aligning internal practices to increase success sooner than attempting to link internal operations to the needs of the company's external environment. To recognize the important role of HRM practices, it's important to realize the important role HRM has in increasing supply chain performance through SC effectiveness and SC efficiency for an organization. Confirming the results of earlier studies, all hypotheses were supported.

The importance of HRM procedures related to supply chain management, such as hiring, training, remuneration, and assessment, has been established by this study. As a result, businesses ought to focus on fostering employee trust. Other methods consist of unconventional hiring practices, thorough training, and allowing staff members greater say in choices. By boosting dedication and job happiness, these techniques can enhance the workplace. With both external benefits based on system-wide measures and internal rewards like achievement and a sense of belonging to a successful company, improved SC performance also helps to increase employee satisfaction. This implies that employing efficient human resources—particularly through the proper application of specific HRM practices—is more important in supporting the growth of supply chain management than trying to adapt these practices to the environment, even in the face of external factors

and competitive conditions. Results-wise, this study demonstrated, How the intensity competition moderates the association between supply chain betterment practices and HRM practices. Nevertheless, this study provides useful information regarding the HRM procedures in this arena. Our future studies may be employ a larger sample size to validate these findings in comparison with rural urban development model of supply chain development model.

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7.Conflict of interest: None

Abbreviations

A.G.F.I - Adjusted goodness fit index
CMIN -Chi-square model
C.F.I- Comparative fit index
CFA Cumulative frequency approximation
D. f- Degree of freedom
G.F.I - Goodness of fit index
HRM – Human resource management
I.C.L.L -Lower confidence interval limit
LCI-Lower confidence interval
N.F.I- Normal fit index
R.M.R - Root mean error
R.M.S.E.A- Root mean square error approximation
S.E – Standard error
S.D – Standard deviation
SCM - Supply chain management
UCI- Upper confidence interval
VIF - Variance inflation factor

REFERENCES

- [1] Fareed MZ, Su Q, Li MS. Project governance and project performance: the moderating role of top management support. Sustainability. (2022) 14:2516. 10.3390/su14052516 [DOI] [Google Scholar]
- [2] Yu C, Wang Y, Li T, Lin CP. Do top management teams' expectations and support drive management innovation in small and medium-sized enterprises? J Bus Res. (2022) 142:88–99. 10.1016/j.jbusres.2021.12.035 [DOI] [Google Scholar]
- [3] Ilyas S, Hu Z, Wiwattanakornwong K. Unleashing the role of top management and government support in green supply chain management and sustainable development goals. Environ Sci Pollut Res. (2020) 27:8210–23. 10.1007/s11356-019-07268-3 [DOI] [PubMed] [Google Scholar]
- [4] Sundram VPK. Supply chain management practices, supply chain integration and supply chain performance: a study of electronics firms in Malaysia. Int J Technol. (2010) 1:48–55. 10.4018/jtd.2010070103 [DOI] [Google Scholar]
- [5] Singh V, Kumar A, Singh T. Impact of TQM on organisational performance: the case of Indian manufacturing and service industry. Operat Res Perspect. (2018) 5:199–217. 10.1016/j.orp.2018.07.004 [DOI] [Google Scholar]
- [6] Piprani AZ, Mohezar S, Jaafar NI. Supply chain integration and supply chain performance: the mediating role of supply chain resilience. Int J Supply Chain Manage. (2020) 9:58–73. 10.5267/j.uscm.2018.11.001 [DOI] [Google Scholar]

- [7] Zhao X, Lee TS. Developments and emerging research opportunities in operations strategy and supply chain management. *Int J Prod Econ.* (2009) 120:1–4. 10.1016/j.ijpe.2008.12.010 [DOI] [Google Scholar]
- [8] Shahin A, Mehr Parvar H, Karbasiyan M. Proposing an integrated framework for selecting performance indicators in service supply chain with a case study in single level bidirectional service supply chain. *Iranian J Manage Sci.* (2017) 12:1–20. [Google Scholar]
- [9] Tan KC, Lyman SB, Wisner JD. Supply chain management: a strategic perspective. *Int J Operat Prod Manage.* (2002) 22:614–31. 10.1108/01443570210427659 [DOI] [Google Scholar]
- [10] Mwale H., Supply Chain Management Practices Organizational Performance of Large Manufacturing Firms in Nairobi, Kenya University of Nairobi. (2014). Available online at: <http://hdl.handle.net/11295/76153> (accessed August 22, 2021).
- [11] Fonseca L. From quality gurus and TQM to ISO 9001: 2015: a review of several quality paths. *Int J Quality Res.* (2015) 9:167–80. 10.31219/osf.io/u6msf [DOI] [Google Scholar]
- [12] Vachon S, Klassen RD. Environmental management and manufacturing performance: the role of collaboration in the supply chain. *Int J Prod Econ.* (2008) 111:299–315. 10.1016/j.ijpe.2006.11.030 [DOI] [Google Scholar]
- [13] Robb DJ, Xie B, Arthanari T. Supply chain and operations practice and performance in Chinese furniture manufacturing. *Int J Prod Econ.* (2008) 112:683–99. 10.1016/j.ijpe.2007.04.011 [DOI] [Google Scholar]
- [14] Karimi E, Rafiee M. Analyzing the impact of supply chain management practices on organizational performance through competitive priorities. *Int J Acad Res Account Finance Manage Sci.* (2014) 4:1–15. 10.6007/IJARAFMS/v4-i1/503 [DOI] [Google Scholar]
- [15] Fan Y, Stevenson M. A review of supply chain risk management: definition, theory, and research agenda. *Int J Phys Distribut Logist Manage.* (2018) 48:205–30. 10.1108/IJPDLM-01-2017-0043 [DOI] [Google Scholar]
- [16] Mosteanu NR, Faccia A, Ansari A, Shamout MD, Capitanio F. Sustainability integration in supply chain management through systematic literature review. *Calitatea.* (2020) 21:117–23. 10.1108/scm-12-2013-049134829170 [DOI] [Google Scholar]
- [17] Mentzer JT, DeWitt W, Keebler JS, Min S, Nix NW, Smith CD, et al. Defining supply chain management. *J Bus Logistics.* (2001) 22:1–25. 10.1002/j.2158-1592.2001.tb00001.x25855820 [DOI] [Google Scholar]
- [18] Jagan MRK, Neelakanteswara RA, Krishnanand L. A review on supply chain performance measurement systems. *Proc Manufact.* (2019) 30:40–7. 10.1016/j.promfg.2019.02.007 [DOI] [Google Scholar]
- [19] Bakar, A., & Hamid, A. (2011). An investigation of the relationship between supply chain management practices and the competitive advantage of the firm Inda Sukati. *Contemporary Marketing Review*, 1(4), 1–13.
- [20] Hashim M, Baig SA, Amjad F, Nazam M, Akram MU. Impact of supply chain management practices on organizational performance and moderating role of innovation culture: a case of Pakistan textile industry. *Int Conf Manage Sci Eng Manage.* (2020) 1002:390–401. 10.1007/978-3-030-21255-1_30 [DOI] [Google Scholar]
- [21] Al-Harazneh YM, Sila I. The impact of E-HRM usage on HRM effectiveness: Highlighting the roles of top management support, HR professionals, and line managers. *J Global Inform Manage.* (2021) 29:118–47. 10.4018/JGIM.2021030107 [DOI] [Google Scholar]
- [22] Kagoya SM, Mbamba UO. The moderating effect of top management support on key attributes to e-government implementation success in developing countries: a study of Ugandan Ministries. *Operat Res Soc Eastern Afr J.* (2020) 10:33–51. [Google Scholar]
- [23] Rohana Y, Mas Bambang B, Suzilawati K, Nooranida A. Moderation effect of top management support on the relationship between customer reference marketing and market performance. *Int J Acad Res Bus Soc Sci.* (2019) 9:1263–97. 10.6007/IJARBSS/v9-i7/6263 [DOI] [Google Scholar]
- [24] Tukamuhabwa, B., Mutebi, H., & Kyomuhendo, R. (2021). A Systematic Review on Supply Chain Risk Management : Issues, Challenges, and Future Agenda A Systematic Review on Supply Chain Risk Management : Issues, *Pakistan Languages, and Humanities Review*, 6(2), 159.173.