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Strategic planning for quality performance through supply chain quality management: A systematic literature review

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Abstract

This study focused on the content of strategic planning, supply chain quality management (SCQM), and quality performance. The history of SCQM has appeared in several previous studies, but the integration of variables, along with the addition of long-term thinking, with strategic planning variables does not provide comprehensive information in the literature. This study aims to present literature results regarding the importance of conceptual integration of Supply Chain Quality Management (SCQM), Quality Performance, and Strategic Planning in a company's operations. This research method involves a systematic literature review. The research results in this literature review reveal the possibility of a relationship between strategic planning, SCQM, and Performance Quality. The implication in the field of science is the addition of new information regarding the variables that have been studied. Meanwhile, the implication for companies is increasing knowledge in carrying out their operations, helping to maintain the quality of supply chain routes from upstream to downstream, thereby increasing the competitiveness of the products produced.

Keywords

Strategic planning, Supply chain Quality management, Quality performance

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Introduction

Studies on performance still have development potential, as mentioned by Moazzam, et al. [1]. Many researchers and practitioners have long recognized the importance of performance measurement. Soares et al. [2] demonstrate a correlation between SCQM and Quality Performance in their research. Experts define Supply Chain Quality Management (SCM) as the integration of the supply chain and a combination of Quality Management (QM) and SCM practices that elucidate the enhancement of quality processes throughout the entire supply chain, from upstream to downstream [2–4]. SCQM, according to [4], has a connection with planning, including its relationship with strategic planning. According to [5-6], strategic planning is a systematic and formal

effort by a company to determine company goals, rules and strategies. This involves creating detailed plans to implement rules and strategies to achieve the company's main goals.

Since the SCQM concept was introduced by Ross [7], there have been a number of studies using various methods. Initial mapping results identified three different approaches, among them a view that supports the relationship between SCQM and Quality Performance (QP), as found in [2].

Second, there is also a conditional view, stating that the relationship between SCQM and QP is not significant overall, but there are several indicators that do not need to be taken into account, as found in [8]. Third, an opposing viewpoint to this correlation can be found in a study conducted by [9]. Their study demonstrates that supplier participation rather than direct QP practices influences organizational performance. The problems revealed in the background can be used as the subject of systematic research related to strategic planning, supply chain quality management, and quality performance. According to previous research, the integration of SP, SCQM, and QP can be carried out to increase the effectiveness of a company's business processes. To strengthen the importance of strategic planning, supply chain quality management, and quality performance variables, clear evidence is needed through a systematic literature review.

Methods

This study uses the Systematic Literature Review method or what is commonly known as SLR. Completing a Systematic Review is an iterative process [10]. The literature review process facilitates the management of diverse sets of information, such as the academic inquiry set out in this study to collectively investigate the interdependencies between Strategic Planning, SCQM, and Quality Performance. The phases of this study are as follows: 1) Sorting articles utilizing application tools, specifically Mendeley and Publish or Perish, in conjunction with a Scopus database; 2) Data processing utilizing the VOS Viewer application to illustrate the interrelationship dynamics among variables; 3) Descriptive analysis and thematic synthesis of the conceptual framework derived from stages 1 and 2 results are to be submitted.

Results and Discussion

Descriptive analysis

Systematic literature review protocol, can start from the identification stage to the included stage [10]. Table 1 shows the stages of the Systematic Literature Review related to Strategic Planning (SP), SCQM, and Quality Performance (QP). The table shows that in total, Source 5 includes 43 articles. The sorted articles are those that mention Strategic Planning, SCQM, and Quality Performance.

Table 1. Sorted SLR data

Variable	Strategic Planning	SCQM	Quality Performance	Phase
Year (since)	1973-2020	1985-2023	1972-2021	Identified
Source 1	673	683	683	
	200	200	200	
Source 2	125	168	181	Screening
Source 3	78	166	18	
Source 4	QP SCQM	QP-SCQM SP-SCQM	SP-QP QP-SCQM	Eligibility
	0 7	17 3	1 2	
Source 5		30		Included

Table 2. Sorted SLR data

No.	Researchers	No.	Researchers
1	Allen C. Amason, 1996 [11]	16	Melo et al. 2009 [12]
2	Thomas and Griffin 1996 [13]	17	Kuei, 2008 [14]
3	Ross, 1998 [7]	18	Azar, 2010 [15]
4	Ghodsypour 1998 [16]	19	Foster, 2011 [17]
5	Kuei & Madu, 2001 [18]	20	Soltani, 2011 [19]
6	Frohlich and Westbrook, 2001 [20]	21	Xu, 2011 [21]
7	Handfield; Robert Sroule; Steven A. Melnyk [22]	22	Chalotra, 2015 [23]
8	Hokey Min dan Geng Zhou, 2022 [24]	23	Jraisat & Sawalha, 2013 [25]
9	Qinghua Zhu, Joseph Sarkis, 2004 [26]	24	Lin et al., 2013 [27]
10	Mark Barratt, 2004 [28]	25	Quang et al., 2016 [29]
11	Flynn* & Flynn, 2005 [30]	26	Bi, 2017 [31]
12	Fynes* et al., 2007 [8]	27	Fernandes et al., 2017 [3]
13	Robinson & Malhotra, 2005 [32]	28	Oschman, 2017 [33]
14	Lo & Yeung, 2006 [34]	29	Soares et al., 2017 [2]
15	Tomlin, 2006 [35]	30	Machado et al., 2019 [4]

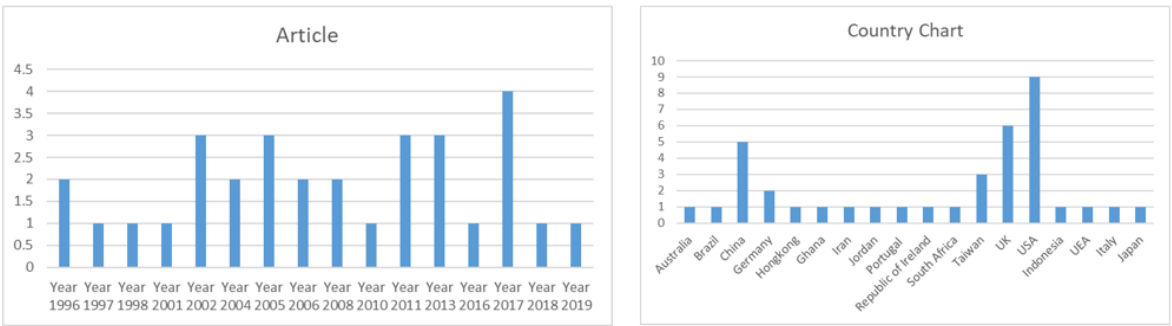

Figure 1. Number of publications per year and country

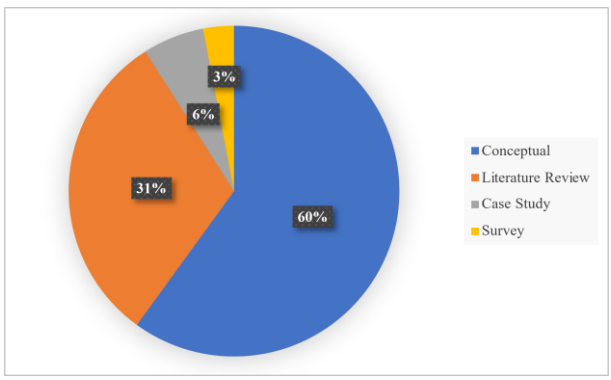

Figure 2. Number of publications per research methodology applied

Table 2 shows the data collected after various stages of detailed screening. There are 3 references that are directly related to SP, SCQM, and QP. Furthermore, Figure 1 shows

the development of research related to SP, SCQM, and QP. The data shows that the most productive research was in 2017, and the country that often conducts SP, SCQM, and QP research is the USA. Figure 2 shows that the majority of methods used are to produce conceptual SP, SCQM, and QP with a value of 60%.

A theoretical framework

The next phase of this research is to formulate a theoretical framework based on the findings from Phase 1 and Phase 2. Figure 3 shows how a more representative conceptual framework can describe the relationship between long-term thinking with strategic planning, then implementing SCQM strategies, and finally the impact on product quality or Quality Performance. Long-term thinking integrated with management has been developed by Wheelen and Hunger since 1984 [36], while SCQM developed after Ross's concept in 1997 [7]. Strategic Planning is one of the planning points in Strategic Management to carry out strategy implementation. SCQM in this framework is in the position of strategy implementation, and after implementation produces performance, the next step is related to performance evaluation and control. Quality Performance is included in the performance evaluation and control section because it is the result of implementing the strategy that has been carried out.

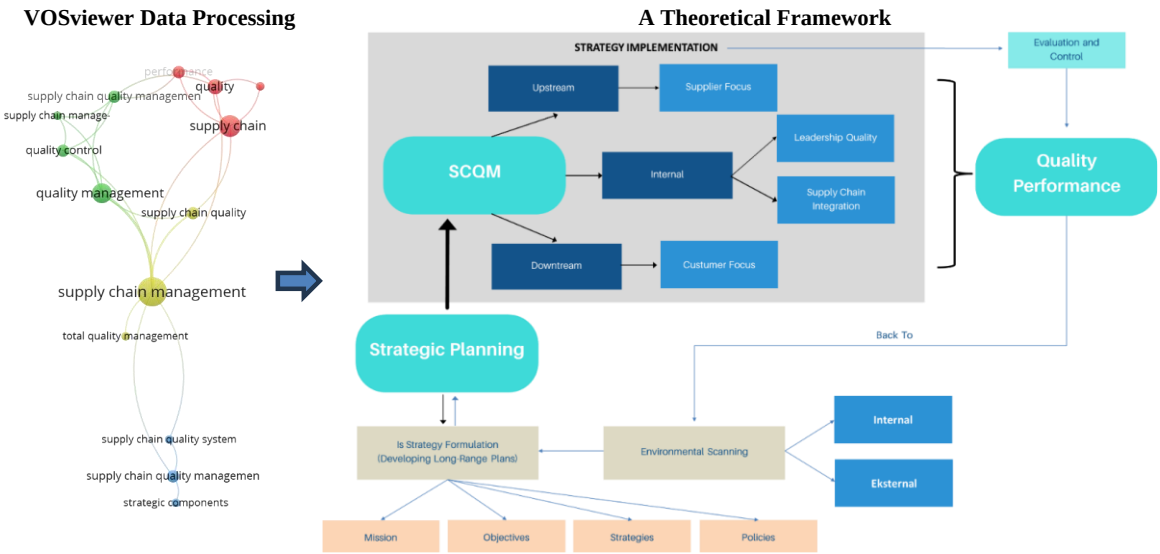

Figure 3. Theoretical framework

Conclusion

Based on the research results, it can be concluded that Strategic Planning is one of the planning stages in Strategic Management to carry out business strategy implementation. SCQM is conceptually in the implementation strategy position, and after implementation produces performance output, the next step is performance evaluation and control. Performance Quality is included in the performance evaluation and control section because it is the result of implementing the strategy that has been implemented. This study produces a Theoretical Framework which shows the importance of Strategic Planning, SCQM, and Quality Performance in maintaining the

quality of supply chain routes from upstream to downstream, so that the quality of the products produced meets the desired quality level and of course increases business competitiveness.

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