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An analytic decision making framework to evaluate multiple marketing channels

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ABSTRACT

Marketing channel evaluation is a crucial and complex task. Although empirical studies have made efforts to identify key constructs, no models have been developed to comprehensively assess the viability of different marketing channels for business. With this research, we propose an analytic decision-making framework for multi-channel evaluation. We first develop an analytic network, based on the inputs of managers and literature, to depict the interrelationships between decision criteria. Multi-Criteria Decision Making methods are then adapted to determine the weight of each evaluation criterion and to rank the practicality of alternative marketing channels. The model is tested with Cisco China. Sensitivity analysis is conducted in order to understand the impact of criteria uncertainties on channel rankings and the robustness of the proposed model. The management at Cisco found the model to be transparent, logical, practical, and it provided a valid and reliable guide for evaluating channel alternatives.

1. Introduction

Marketing channel management is an important and demanding task particularly in multi-channel environments. Due to the emergence of electronic commerce on the Internet (Chiang, Chhajed, & Hess, 2003) and the micro-segmentation of consumer groups (Day, 2011), multi-channel distribution systems have been adopted by many manufacturers in order to reach unexplored markets and help to lower distribution costs (Rangaswamy & Van Brugeen, 2005). Despite the potential merits of multiple distribution systems, marketing channel managers have to deal with many challenging issues such as understanding priorities confronting channel members, creating channel synergies, resolving channel conflicts, and indentifying optimal channel mix (Achrol & Etzel, 2003; Rosenbloom, 2007).

For channel managers, choosing the optimal distribution mix in multiple distribution systems is extremely puzzling since each distribution channel possesses particular strengths and weaknesses. For example, websites have the benefits of displaying products online, building virtual communities for customers to share shopping experiences, and collecting product reviews for further market analysis (de Valck, van Bruggen, & Wierenga, 2009; Duan, Gu, & Whinston, 2008). However, websites tend to have lower sales per account (Sharma & Mehrotra, 2007), longer lead times, and higher rates of product return. On the other hand, companies that have key account management teams, have higher sales per account, are more costly and riskier to manage (Pillai & Sharma, 2003), and focuses exclusively on VIP customers (Guenzi, Pardo, & Georges, 2007).

Another challenge associated with the management of multiple marketing channels is to unravel various ways relevant factors may interact with each other in a specific distribution situation. For example, different autonomous distribution channels may target the same customer segment, leading to channel conflict and in turn, an increase of channel coordination cost. On the other hand, perceived unfairness in channel relationship is also likely to exacerbate negative feelings (Sprecher, 1986), and motivates channel members to punish or retaliate the offending party (Fehr & Gächter, 2000; Offerman, 2002), thus also resulting in increased coordination costs. In addition, other factors in multi-channel environment such as channel functions and channel performance are likely to be highly correlated. Effective information exchange can enhance channel capabilities which in turn affect a firm's market performance (Kim, 2007). For instance, in order to attract online customers to purchase multiple products in one transaction, online recommendation system (ORS) is developed to gauge customers' preferences which provide valuable information to cross-sell products that might interest customers (Linden, Smith, & York, 2003). The acquired market information from online channel can also be applied to boost

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Table 1
Existing managerial decision-making approaches to evaluate marketing channels.

	References	Strength	Weakness
Channel performance oriented method	Cravens et al. (1991) Sharma and Mehrotra (2007) Gensler et al. (2007)	Provide guidance to deploy sales efforts across multiple marketing channels with the objective of maximizing channel performance	Need to consider non-financial selection criteria
AHP and TOPSIS in assessing multi-channels	Huang et al. (2009) Fu et al. (2008) Yu et al. (2011)	Include all possible factors in the evaluation framework of marketing channels	Need to consider the interdependence relationship among evaluation criteria

sales in offline channels. In short, unlike managing a single distribution channel, management and evaluation of multiple marketing channels involves significantly more complex analysis.

In response, decision procedures need to be developed to help marketing channel managers understand how to deploy multiple channels so as to realize their full potential (Frazier, 1999). Within the field of decision sciences, the evaluation of multiple marketing channels can be seen as Multi-Criteria Decision Making (MCDM), because it involves trade-offs between many important concerns. The strength of the MCDM approach lies in its ability to address a complicated problem by considering many relevant variables (decisive factors) as well as the strategic goals of the firm. With the aid of the MCDM framework, we feel channel managers can better assess the importance of the pertinent factors, rank the alternatives, and then select the most appropriate marketing channel strategy for their business.

2. Literature review

A firm is said to employ a multi-channel strategy when it launches products to market through two or more channels, directly or through third parties (Coelho & Easingwood, 2008; John & Weitz, 1988; Shervani, Frazier, & Challagalla, 2007). Key Account teams are responsible for handling the firm's largest accounts, while external distributors are sometimes used for medium or small customers (Moriarty & Moran, 1990). In order to attract customers and increase market share, marketers often adopt several channels to reach diverse customers. For example, Internet distribution strategy has become an effective and formidable alternative. U.S. online retail sales reached $141.3 billion in 2008 and rose to $156.1 billion in 2009 (Internetretailer.com, 2009). E-commerce has had a substantial impact on the way businesses communicate with their customers. To establish an online marketing channel, several alternatives are available. For instance, Dell uses a company-based website, while other firms may adopt shared website such as eBay. Driven by the emerging online channel and the complexity of the markets, the number of distribution channels has increased from three to more than ten, including company stores, shared and exclusive dealers, telemarketing agents, and affinity partners (Day, 2011). Specifically, the direct distribution channel includes company sales force, company sales branch, telemarketing, internet, and catalog, while the distribution channel through third parties includes sales agents, brokers, distributors, and value added resellers.

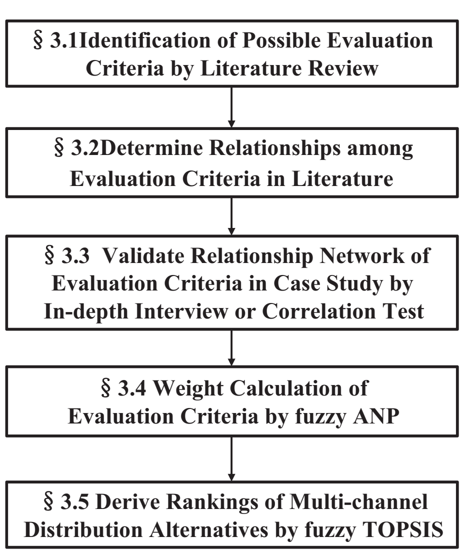

Fig. 1. Evaluation procedure of multi-channel distribution strategies.

To address the issues in multi-channel management, researchers have identified a number of critical factors that affect multi-channel strategies. For example, a number of studies indicate that distribution costs play a key role in selecting a channel. Kabadayi (2011) suggests that firms are able to minimize the transaction costs in sales channels if the channel chosen properly matches its business. Past research has also examined the relationship among crucial constructs in channel management (Agatz, Fleischmann, & van Nunen, 2008; Kabadayi, 2011; Kim, 2007; Luo, Liu, & Xue, 2009). The results indicate that there exists a complex interdependence relationship among them (Cheng, Tsao, Tsai, & Tu, 2007; Panayides, 2007). These general findings provide insights into multi-channel environments and form the basis for the development of an analytical model that can be used for selecting an optimal mix of distribution channels.

2.1. Evaluating distribution channels based on channel performance

Although studies have identified a number of relevant factors that should be considered, it would be particularly helpful if a reliable model was available for management to use to assess the viability of different marketing channel options. In response to that need, several processes have been proposed. A number of these methods tie channel performance with financial metrics, such as sales per account, cost and profit (Gensler, Dekimpe, & Skiera, 2007; Kabadayi, 2011; Sharma & Mehrotra, 2007). Specifically, Cravens, Ingram, and LaForge (1991) presented a selling effort portfolio model to enable sales management to allocate marketing responsibilities and restructure distribution channels. With the goal of minimizing channel cost. Alptekinoglu and Tang (2005) developed a distribution policy strategy to be used across different marketing channels. Using customers' intrinsic loyalty and switching behavior as indexes of channel performance. Gensler et al. (2007) provided a maximum likelihood estimation method to evaluate multi-channel systems. In addition, Sharma and Mehrotra (2007) proposed a breakeven based decision-making procedure to determine a financially optimal distribution mix for B2B marketers by addressing the trade-offs between market coverage and potential conflicts. Though these models provide important insights to developing an effective channel, financial considerations are just one of the concerns that must be taken into account.

Specially, another key factor to understand when choosing appropriate channels is the relationship between channel members. A distribution system that has discordant relationships between members will eventually be a dysfunctional one over the long run, even if it excels financially at present. Thus, evaluation models focusing solely on channel performance are very likely to overlook other key objectives and their interrelationships, and mostly will derive sub-optimal solutions.