Chapter III

Electronic Supply Chain Partnerships: Reconsidering Relationship Attributes in Customer-Supplier Dyads

Rebecca Angeles, University of New Brunswick Fredericton, Canada
Ravinder Nath, Creighton University, USA

ABSTRACT

This chapter is focused on discovering important trading partner selection criteria that are relevant in electronic data interchange (EDI)-enabled relationships. Increasing implementation of integrated supply chain management (SCM) and collaborative commerce initiatives call for the cultivation and maintenance of long-term strategic partnerships such as those engendered by EDI. A body of evidence shows that hub firms (i.e., firms that initiate technology-enabled partnership networks) are getting choosier about their trading partners. However, there is a need to understand specific trading partner attributes that are more likely to ensure successful long-term relationships. Using the survey technique, this study brought forth respondents from customer and supplier firms engaged in EDI applications; the final respondent sample ended up with a pool of firms...
primarily in the manufacturing sector. Factor analysis uncovered six trading partner selection factors which both customer and supplier firms thought were critical in selecting partners: strategic commitment of top management, readiness for high-level EDI, joint partnering, trading partner flexibility, communications, and EDI infrastructure. Overall, customer firms regarded a number of trading partner selection factors with a higher level of criticality than did the supplier firms. Customer firms have historically been ahead in initiating EDI networks that may partly explain their higher level of awareness of the implementation requirements involved. This is reflected, for instance, in one other finding that shows customer firms highly valuing the trading partner flexibility and joint partnering factors, which is indicative of their understanding of the collaboration process. Specific items of the trading partner selection factors that correlate highly with many EDI network system success measures are also articulated in the study. The effect of the network initiator status was also taken into consideration after looking at the firms’ perceptions of the success of the EDI network. Customer firms perceived their EDI systems to be successful whether they had a customer firm initiator in their network. Network initiator status appears to have a marginal effect on customer firms in this way. On the other hand, a supplier firms with a supplier initiator in the network perceived the system as more successful than supplier firms with a customer initiator. It behooves managers of systems using EDI, particularly of supplier firms, to understand the findings of this study in order to enhance their position as a desirable potential trading partner for customer firms that they value. Unless the supplier is in the rare position of having high bargaining power in the marketplace, for instance, having a near monopoly over certain goods or services, it behooves the supplier to enhance its position in the eyes of the customers. This is especially necessary in marketplace segments where suppliers fiercely compete for targeted customer accounts. This study’s findings have important implications for strong partnerships involved in integrated supply chain management initiatives and collaborative commerce.

INTRODUCTION

This chapter looks at how attributes of electronic supply chain partnerships have evolved from the manner they have developed during the era of traditional electronic data interchange (EDI) environment to today’s initiative toward collaborative commerce. There are two sections in this chapter. Section 1 describes partnership attributes under the traditional EDI environment and the literature is traced through different periods to appreciate how academicians and