# Chapter 7.23
# Global Integrated Supply Chain Implementation: The Challenges of E-Procurement

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## ABSTRACT

Supply chain functions must operate in an integrated manner in order to optimize performance. However, the dynamics of the organization and the market make this challenging. In particular, the procurement function is a crucial link between the sources of supply and the organization. With most organizations spending at least one-third of their overall budget to purchase goods and services, procurement holds significant business value. Emerging technologies, especially e-procurement, are promising to change the picture of traditional procurement processes. However, the implementation of e-procurement is facing significant reengineering and change management challenges. This study identifies four main challenges in e-procurement implementation: business process integration, technological issues, value creation, and change management. The major challenge among them is change management. Critically, leadership is one of the primary requirements to make the change successfully.

## INTRODUCTION

The supply chain is a network of suppliers, factories, warehouses, distribution centers, and retailers through which raw materials are acquired, transformed, and delivered to the customers. Supply chain management is the strategic, tactical, and operational level decision making that optimizes supply chain performance. The strategic level defines the supply chain network (i.e., selection of suppliers, transportation routes, manufacturing facilities, production levels, warehouses, etc.). The tactical level plans and schedules the supply chain to meet actual demand. The operational level executes plans. Tactical and operational

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level decision-making functions are distributed across the supply chain.

In order to optimize performance, supply chain functions must operate in an integrated manner. However, the dynamics of the organization and the market make this challenging; materials do not arrive on time, production facilities fail, workers are ill, customers change or cancel orders, and so forth, causing deviations from the plan. In particular, the procurement function is a crucial link between the sources of supply and the organization. With most organizations spending at least one-third of their overall budget to purchase goods and services, procurement holds significant business value (Killen & Kamauff, 1995; Zenz & Thompson, 1994). Emerging technologies, especially Internet-based procurement, are bringing the promises to change the picture of costly, time-consuming, and inefficient procurement processes by enabling major improvements in terms of lower administrative overhead, better service quality, timely location and receiving of products, and increased flexibility. Meanwhile, growing pressures from increasingly competitive markets all around the world reinforce the need to reorganize and streamline inefficient procurement procedures.

The corporate procurement traditionally has been separated along two dimensions: the direct or production-oriented procurement and the indirect or non-production-oriented procurement. Direct procurement generally refers to the purchasing of items that immediately enter a manufacturing process, such as the parts that are assembled into a car or computer. Indirect procurement includes everything that is not covered by direct procurement; for instance, maintenance, repair, and operations (MRO) supplies that are consumed in the production process and required to keep up the manufacturing process. Indirect procurement also includes items as diverse as office supplies, computer equipment, promotional material, travel, and other services (Segev, Gebauer & Farber, 2000). Other researchers also include items in the indirect category such as training materials, accessories, temporary staff, public relationships, entertainment (Croom, 2000), and contract workers and consultants (Moozakis, 2001).

The direct procurement has been emphasized and treated differently than indirect procurement. Compared to direct procurement, indirect procurement covers a wider range of products and services that typically are involved with a larger number of buyers (possibly every employee) and is much less predictable with respect to buying volume and frequency. It often is not regarded as strategic relevance but rather as a clerical function. Thus, it comes at no surprise that businesses processes typically are not well standardized, most paper-based, and, as a result, inefficient and non-transparent (Gebauer & Segev, 2001).

Incidentally, the difference between direct and indirect procurement also shows in organizational charts; direct procurement often reports to a vice president of supply chain operations (or similar), while indirect procurement might fall into the responsibility of the finance function. The line of management for both areas only meets at the level of the chief executive officer. In the literature, the indirect products and services have received little attention, as by far the dominant focus of the purchasing literature has been the management of production item procurement. However, a multinational company may spend millions of dollars of expenditure on indirect goods and services. Much of them may be carried out locally or divisionally, bypassing central guidelines. For example, a large manufacturer bought office supplies from as many as 300 suppliers regularly, more or less. Nobody was in control of the overall process, and each business unit had its own procedures in place. From a corporate perspective, the fragmented procurement resulted in slow and expensive processes and excessive product costs due to poor leverage of buying power (Nelson, Moody & Stegner, 2001). According to PricewaterhouseCoopers, a 10% reduction in purchase costs easily can lead to a 50% rise in profit margin.

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