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VALUE CREATION IN BUSINESS NETWORKS

Abstract:
A value network is a complex set of social and technical resources. Value networks work together via relationships to create social goods (public goods) or economic value. This value takes the form of knowledge and other intangibles and/or financial value. Value networks exhibit interdependence. They account for the overall worth of products and services. Companies have both internal and external value networks.
The network value system: integrated demand and multi-layered supply chains. They have attempted to meet all the changes identified within the new economy. Network value system management has focused on moving products and services downstream towards the customer.

Keywords:
Industrial clusters, organization, supply chains, business network

INTRODUCTION

Successful clusters are made up of companies that are constantly seeking innovation. Innovative companies not only seek to develop new products, but also are looking for all types of innovation in process improvement. This innovative capacity is a combination of innovation and imitation. Continuous innovation is the ability of the cluster to generate key innovations in products, processes, designs, marketing, logistics, and management. Almost all the clusters we visited have significant innovative capacity and place a priority on continuous innovation. This characteristic is particularly important when placing low and moderate income residents into jobs. It provides a work environment where different approaches and new ideas are valued often allowing a lower level employee to make a significant contribution.
In competitive environment success of an organization is a function of industry attractiveness, its relative position in the industry, and the activities (strategy) it undertakes to remain ahead of others ([7] and [9]). Mintzberg explained that strategy is evolutionary, organic process and is unpredictable; [15] explained that core competence gives an organization competitive capability and remains central to its strategy planning process. Small and medium organizations (SME) encounter different kinds of problems such as resource limitations (especially human and financial resources), and market information [16], they face competition within and between large organizations [4].
Quality improvement in a firm's must encompass much more than just machinery or technology improvement. Technology is a much more complex bundle of knowledge, with much of it embodied in a wide range of different artifacts, people, procedures and organizational arrangements. These embodiments of knowledge include at least: product specifications and designs; materials and component specifications and properties; machinery and its range of operating characteristics; together with the various kinds of know-how, operating procedure and

organizational arrangement needed to integrate these elements in an enormously variable range of different production systems. Moreover, as these elements of technology are highly interconnected, improvement in something as "simple" as product quality may require changes to be made across several linked elements of the bundle, e.g., in machine hardware or operating procedures, the organization of production flows, or the specification and treatment of materials.

Second, there is no sharp distinction between innovation and diffusion. Very few components of production technology are simply acquired "ready-made" and then brought into use according to standard "recipes" which are identical to, and replicated from, previous applications. Even in cases where the introduction of some element of new technology involves a fairly close approximation to such noncreative technology "adoption," the interactions with other elements of technology in the production system typically requires creative problem-solving and innovative re-configuration of at least some elements in the overall production system. Furthermore, firms do not acquire the capabilities to generate these creative changes spontaneously merely from the experience of doing production, as implied by notions of learning curves. Indeed, studies of infant industries have demonstrated that the performance of production systems may not increase at all over time, and can easily stagnate or decline over the long-run.

Third, external sources of technology are not limited to machinery suppliers. Customers, for instance, may be much more important sources of technology, providing not just knowledge about product specifications but also a wide range of other elements (e.g., operating procedures and know-how, or knowledge about materials properties).

It is clear we need new lenses and tools to succeed in this current economic environment — understanding of how people, process and technology really work together to create both social and economic value.

Tools used in the past to analyze business value creation, such as value chain and process models, are simply too slow, inadequate, or inappropriate to address this new level of business complexity. Instead of that, company has to find way to create quality management system in a multi-layered supply chain.

Strong value creating relationships support breakthrough innovation, quality management and organizational resilience. The value network approach helps individuals and work groups better manage their interactions and address operational issues, such as balancing workflows or improving quality of the process or product. It also scales up to the business level to help forge stronger value-creating linkages with strategic partners and improve stakeholder relationships.

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The network value system: integrated demand and multi-layered supply chains. They have attempted to meet all the changes identified within the new economy. Network value system management has focused on moving products and services downstream towards the customer. Typically the multi-layered supply chain is coordinated by manufacturing companies or dominant resellers who use in-house manufacturing and distribution facilities to achieve market-based objectives such as market share volumes and customer penetration.

Demand chain management changes the emphasis towards "customization", responding to product and service opportunities offered by specific customers or customer groups sharing particular characteristics. It is crucial to segment customers intelligently in order to offer more targeted and personalized products and services. The preference is to outsource rather than own the functions and processes that facilitate and deliver value. Focus is on asset leverage and communication through distributed assets and outsourcing.

CHALLENGES FOR BUSINESS NETWORK

At a first glance, the establishment of value networks seems to provide a promising future for relationship marketing concepts [1]. As companies reduce their degree of vertical

integration and begin to rely on a network of specialized companies for supporting operations, they tend to contract with suppliers who are able to cooperate in a relationship context [2]. Understanding customers' processes and value propositions is therefore vital for suppliers, as is a climate of shared relational norms and mutual trust. Academic research, however, also cautions against the naive application of relationship concepts, which proved valuable in the context of rather stable buyer–seller relationships, to be applied to a dynamic value network context.

In his study of value networks in the hard disk drive industry, Christensen [3] showed how network dynamics destroyed the value propositions of established relationships. The establishment of new product architectures, for example, the introduction of the personal computer, led to the establishment of new organizational architectures in value networks. Each new architecture bred a new dominant supplier of hard disk drives, who drove the then incumbent out of the market. The surprising conclusion shown by Christensen's work is that the suppliers were driven out of the market mainly because they actively listened to their most important customers and implemented a standard textbook approach to buyer–seller relationships. Furthermore, the incumbents had all of the technologies in their R&D pipelines, which shortly after materialized in the competing value networks, but which they themselves were not able to apply due to the implied restrictions of their existing relationship context. Seemingly, their rather narrow relationship approach was what eventually drove them out of the market. The notion that being customer-driven is no equivalent to being market-driven is neither new to traditional nor to relationship marketing concepts ([5] and [6]).

In contrast to early visionaries who saw an uninterrupted growth of relationship concepts induced by the increasing significance of value networks, management and academic research face the following challenges:

- *Gaining a clear understanding of the essence and the scope of relationship management and a clear definition of the concepts used: In a value network, the interaction leaves the stage of the dyad, giving way to multiple relationships with different and sometimes conflicting goals and a growing range of roles performed by participating companies, including multiple tiers of connected suppliers, resellers, and influencers. In such a complex context, the growing interest in concepts like relationship marketing and CRM somehow adds to the confusion rather than providing a clear understanding of problems, tasks, and concepts for how to manage in this complex network context.*
- *Adapting relationship strategy to network contexts: Traditional buyer–seller concepts focus narrowly on the value created in a dyadic buyer–seller interaction. As corporate actors are likely to multiply in a network context, each strategy has to take into account the structure and dynamics of value networks. Customer portfolios have not only to reflect the lifetime value of the set of relationships a company is engaged in, but also to account for its position in the overall network. Furthermore, as competition is always present within networks, a dominant goal is to reach a formidable value position within the network.*
- *Adapting the customer interface to the growing complexity of marketing channels: As the touch points to customers and partners involved in the marketing process multiply, the customer interface has to enable the company to interact through different sets of marketing channels with different partners. While the technical means of reaching a customer have multiplied, the integration of these contact points in the framework of a coherent strategy has become more complex.*
- *Develop core competencies for reaching a unique selling proposition in the value network: Whereas functional integration was the main focus in the context of buyer–seller relationships, value networks call for the dynamic evolution of a company's capabilities. As network competition forces companies to focus on activities that they can perform in the most effective and efficient way, the identification and cultivation of core competencies become the central tasks of management.*

CLUSTERS AND VALUE CHAINS

The distinctive contribution of global value chain analysis, as developed initially by Gereffi [7] and developed further by a group of researchers who met together in Bellagio in

September 2000 [8], lies in three main points. Firstly, it analyses how these dispersed production and distribution systems are co-ordinated. In particular, it suggests that in addition to co-ordination through market mechanisms and through vertical integration (the firm), global markets are increasingly coordinated through the formation of networks of firms. This sometimes involves complex co-ordination of activities (product design, process specifications and timing) between firms with no ownership links. The development of divisions of labour within these networks means that firms are frequently neither "complete" nor producing finish products. Secondly, global value chain analysis recognizes and emphasizes the role played by non-manufacturing companies — designers, retailers and branders — in the construction of globally-dispersed production and distribution systems. It distinguishes between different types of value chain governance and examines their consequences for knowledge flows, access to developed country markets and upgrading opportunities. Thirdly, the analysis considers the different ways in which firms within global value chains can upgrade. However, it is important to recognize that global value chains display a variety of different "governance structures" (or forms of co-ordination). In fact, the way in which the activities at different points in the chain are co-ordinated varies considerably, not only between chains but also at different points in the same chain. What linkages might exist between local firms and the global economy? The Italian industrial district literature emphasizes two main linkages: arm's-length market relationships and vertical integration. Arm's-length market relationships occur when products are standardized, or easily customized to particular buyer requirements, or designed by the producer without co-ordination with specific buyers. The purchasers of such products are "design takers": the design of the product is in the hands of the producer. In the case of finished products destined for consumers, the agents buying these products from clusters are most likely to be wholesalers, traders selling to a variety of customers and retailers (particularly small retailers or consortia of small retailers). By contrast, vertical integration involves direct co-ordination of activities within the firm. The most obvious form of this is through foreign direct investment into clusters. However, firms in developing countries may invest into developed country clusters, either in order to guarantee their position in these markets or in order to gain access to the knowledge base of other clusters. For example, some companies in the Sialkot surgical instruments cluster have established trading firms in the Tuttlingen cluster in order to facilitate access to German and global markets [10]. However, trade is also co-ordinated through networks of legally independent firms using a variety of transactional relationships. Thirty years ago, Richardson [11] referred to this as "the dense network of co-operation and affiliation by which firms are inter-related". Global value chain research suggests that such relationships can increasingly be found in international trade. It is possible to distinguish two particular forms of such relationships. On the one hand, network relationships involve greater interaction between buyers and sellers, usually based on the sharing of competences, which allows a product to be manufactured which neither company alone would have the ability to design and/or make. In this case, cluster firms will tend to have long-term, complex relationships with the network partner.

Arm's-length market relationships: describes a relationship where there are potentially many buyers and sellers for equivalent products, even though particular buyers and sellers may engage in repeat transactions. This implies that the producer either makes a standard product or designs the product without reference to the needs of any particular customer. The customer is a "design taker". It also implies that there is no transaction-specific investment required by either party to the transaction.

Network relationships: occur when the supplier and buyer combine complementary competences. They may jointly design the product, using their different competences, and transaction-specific investment will be made. This type of relationship is particularly evident when both buyer and supplier are innovators, close to the technology or market frontiers, but it also arises when firms focus on their core competences and outsource important activities to suppliers.

Quasi-hierarchical relationships: occur when one party to the transaction (usually the buyer) exercises a high degree of control over the other.

This often includes specifying the design (or the general specification) of what is to be produced and also process parameters such as quality systems, materials, etc. The introduction of monitoring and control procedures and the transmission of product design features requires transaction-specific investment.

Hierarchical relationships: occur, firstly, when the buyer takes ownership of the producers in the cluster or establishes its own companies within the cluster, or when firms in the cluster integrate forwards, establishing production or distribution facilities in other countries..

But why would companies want to develop quasi-hierarchical relationships? Such relationships are costly, requiring asset-specific investments in relationships with particular suppliers. Such investment also increases the rigidity of supply chains by raising the costs of switching suppliers. Nevertheless, many instances of such chain governance are evident. Humphrey and Schmitz [12] argue that buyer specification of product design is most likely to arise when the buyer has a better understanding of the demands of the market than the supplier. This requires explicit co-ordination of the value chain if the response to these.

CONCLUSION

All firms have either explicit or implicit strategies, and the economic development of a region depends on the soundness and execution of the many strategies of the firms that make up the region's driver industries. Those establishments succeed or fail based on a mixture of production prices that reflect input costs, products that reflect development and innovation, and management practices. At question is the length of time the virtuous circle of industry birth, cluster economies, innovation, and rents lasts. How long before rents are competed away in the product market by cheaper substitute products and in the labor and land markets by places that offer lower factor costs? How do the industrial, institutional, and social structures of regional economies influence innovation? Where in the product cycle does the firm begin to internalize cluster economies? This is where strategy plays its hand. It also is where cluster economies either spur economic development or deter it if the industrial and social structures of the region ossify, innovation and development are thwarted, and the existing competitive advantage of the region is whittled away by more innovative regional economies.

Cluster enables high-performance production, and provides optimal use of capacities and great flexibility of the entire system. Such systems enable the production in small series with very low costs. Since there is a large number of small and medium-sized enterprises, any changes in processing, shaping or any changes of material are solved within a few enterprises either by replacement or purchase of a small number of machines or by including in the cluster some companies with required developed technology, and by doing so we achieve a very fast reaction to any disorder or any changes. It means that the processes of development are carried out simultaneously, because each company gets the task to develop a part of a product for which they are specialized, and doing so we achieve the development of shorter duration, and increased number of different combinations available for utilization.

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