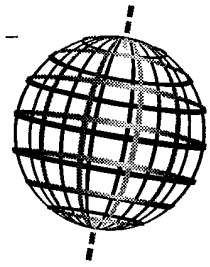
Partners across Borders: The Five Partners Business Network Model



ALAN M. RUGMAN
University of Toronto

JOSEPH R. D'CRUZ
University of Toronto

ABSTRACT

This paper develops a framework for an alternative governance structure to markets and hierarchies. The five-partners business network is distinguished by its strategic asymmetry, which facilitates the establishment of credible commitments. The theory of business networks incorporates the contributions of transaction-cost economics and the embeddedness of economic action in social relations.

RÉSUMÉ

Les réseaux d'affaires représentent une solution de rechange à la façon actuelle de gérer les marchés et les hiérarchies. Le réseau de cinq associés se distingue par une asymétrie stratégique qui rend plus facile la mise en place d'engagements crédibles. La théorie des réseaux d'affaires s'appuie sur les apports de la théorie économique des coûts de transaction et sur le fait que l'action économique est inséparable des relations sociales.

RESUMEN

Este artículo desarrolla las bases de una solución alternativa a la forma actual de dirigir los mercados y las jerarquías. La red de cinco asociados se caracteriza por su asimetría estratégica, lo cual facilita el establecimiento de compromisos que gocen de una sólida credibilidad. La teoría de una red de negocios se basa en los aportes de la teoría económica sobre los costes de transacciones así como en el hecho de que la acción económica es inseparable de las relaciones sociales.

In this paper we introduce the five-partners model of a "business network". A business network is a governance structure for organizing exchange through co-operative, non-equity relationships among firms and non-business organizations. The business network consists of five partners – the flagship firm as the lead partner, key suppliers, key customers, selected competitors with which strategic partnerships have been formed, and the non-business infrastructure (which includes government). This latter set of mainly service-related sectors is viewed explicitly as a partner, and its inclusion is new to the literature on business networks. The flagship firm is a multinational enterprise that competes globally and sets international benchmarks for the entire business network.

As the primary theme of this paper, we propose that the business network, as we define it, can ameliorate the costs inherent in opportunism in markets and asset specificity in hierarchies. Further, we believe that such a network of interfirm linkages is most effective when there is asymmetric control by the flagship firm over the strategic direction of the network. We argue that asymmetry in regard to a narrowed strategic agenda for the network as a whole has important implications for the level of trust, stability and knowledge development in the network. The concept of asymmetric strategic control by the flagship firm is a distinguishing feature of our business network. This asymmetry need not be characteristic of the whole of the relationship with each partner. In other words, any given partner of the flagship firm may compete in other, non-related industries. Therefore, those aspects of the partners' businesses which are not pertinent to the business system of the network will be operated separately by the partner and without influence from the flagship firm. The asymmetry in the relationship between flagship firm and partner reflects the strategic leadership of the flagship in those aspects of the partner's business system which are germane to the network's strategic intent (Hamel and Prahalad, 1989).

As a secondary theme of this paper, we argue that the five partners governance structure can establish credible commitments (Williamson, 1985) and efficiently transmit knowledge and know-how. We build upon related work by Kogut and Zander (1993) and develop a model where social relations are embedded in the five partners framework (through a common understanding, code or language) to facilitate its effective strategic management.

This paper draws upon the work on networks in the field of strategic management by Ouchi (1980) and Jarillo (1988) and on strategic clusters by Porter (1990). It also draws upon the transaction-cost work of Williamson (1975, 1985), especially the concept of opportunism and its applications to the theory of the multinational enterprise (e.g. Rugman, 1981), and upon the concepts of relational contracting (Ring and Van de Ven, 1992) and embeddedness (Granovetter, 1985).

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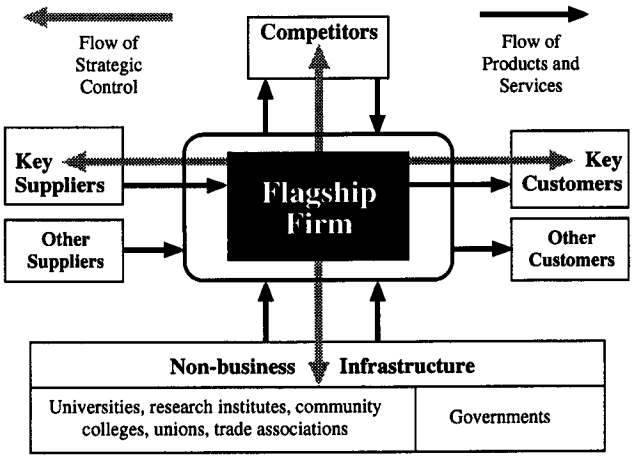
The Concept of the Business Network

In this section, we describe the nature and structure of the business network and advance a rationale for structuring relationships among the five partners. Of particular importance is the leadership role of the flagship firm.

At the core of the business network is a flagship firm.[1] This is a large multinational enterprise (MNE) that has a global perspective on its industries and the resources and capabilities for crafting and executing global business strategies. The MNE's choice of entry mode, whether by international trade, foreign direct investment, licensing or joint venture is a major component of these strategies (Rugman, 1981). Figure 1 shows the five partners and the key elements of a business network.

FIGURE 1

Elements of a Business Network



In the past, the multinational enterprise would "internalize" ownership of a set of core competencies or firm-specific advantages to gain a competitive advantage over its global rivals. Internalization often meant vertical or horizontal integration, or both, so as to monitor, meter and regulate the use of its proprietary knowledge (Rugman, 1981). This view of internalization, so as to reduce the transaction costs of the public-goods nature of knowledge, is readily linked to the tacit know-how focus of the resource-based view of strategic management, as summarized by Wernerfelt (1984) and Conner (1991), amongst others.

What is now occurring in large firms, however, is a great deal of deintegration of business system activities (see Blois, 1990). Increased flexibility and responsiveness to the market are important catalysts for vertically integrated firms to deintegrate value-added activities to their network partners. Moreover, advances in communications technology, such as electronic data interchange and shared software development interfaces, have increased the feasibility of outsourcing important activities. A good example of the extent of outsourcing can be found in Lorenzoni and Baden-Fuller's (1993) description of Nintendo.

In the business network, the flagship firm must provide strategic leadership and direction to its partners. Essential to the functioning of the business network is the willingness of these partners to agree that the flagship firm is the lead partner in crafting strategies for the network as a whole. Because the flagship firm is a multinational enterprise accustomed to designing global strategies, the strategic purpose of the business network is best driven by the flagship firm's global perspective and benchmarks. Otherwise, it is unlikely that a coherent and globally oriented focus can be created through negotiation among the partner firms and the non-business infrastructure. Given that the network partners may be large firms (or government), it is reasonable to assume they may compete in industries not related to the network's business system. In these businesses, the partners will operate independently and will not take strategic direction from the flagship firm. Still, in regard to their participation in the network's business system, presumably the partners have decided that it is in their best interests to follow the strategic leadership of the flagship firm. This would suggest, therefore, that there is substantial benefit to be gained from participation in the business network.

In exchange for giving up autonomy in strategic decision making for the network as a whole, the flagship firm's partners expect and receive a series of rewards.[2] Let us examine the role of key suppliers in this light. First, flagship firms will adopt some form of a supplier-reduction program when switching to a network-style approach to procurement. Thus the chosen supplier benefits through the increased volume and multiyear supply contracts that accompany participation in the network. Tier-one suppliers to the North American automobile manufacturers are a good example of this network preference for adopting key suppliers. The suppliers' business risk can be significantly reduced, partly because of reduced uncertainty that accompanies multiyear, open-ended contracts (Fama, 1980) and partly because the flagship firm assumes some risks related to technology and capital expenditures. In terms of the reduction of risk for

1. A flagship firm is a multinational enterprise and is different from Jarillo's (1988) "hub" firm. He uses the term to refer to the hierarchical leader of a "strategic" network, whereas we use it to refer to asymmetric strategic leadership of a "business" network by a flagship firm in areas agreed upon with network partners. It is also different from the firm at the centre of Harrigan's "spider's webs" (Harrigan 1988) and from her "focal business unit" in a vertically integrated network (Harrigan 1985). Neither of Harrigan's firms is a multinational enterprise with network partners operating across borders, as is the case of our flagship firms.

2. Perhaps the key challenge for the flagship firm is its ability to increase trust among the partners in the business network. Following Williamson (1975), opportunism is a major transaction cost facing any business network, so the flagship firm's ability to build trust and cooperative behaviour, to the benefit of all partners, becomes a critical issue. Jarillo (1988) makes a similar point for his "hub" firms.

the auto suppliers, it is still debatable whether the automobile manufacturers assume a reasonable level of capital or technological risk in their dealings with their key suppliers.[3] This is especially pertinent to key auto suppliers that must make large investments in assets specific to fulfilling the supply contract and must necessarily be concerned with the stability of the multiyear contract. Second, network suppliers will capture a greater share of the value added in the business network, primarily through transfer of value added activities previously performed by the flagship firm.

A similar pattern, with a few significant differences, emerges with respect to the key customers that become part of the business network. Network relations with customers have distinctive aspects, since customers need not be final consumers. Customers in a business network are best regarded as part of the production process, i.e. intermediaries between the flagship firm and final consumers. Examples are agents and distributors. Strategy development in the relationship requires that the flagship firm understand the customer's customer. Thus market segmentation and targeting begin with strategic analysis of the final markets that the intermediate customer serves, and choices made in this regard inform and guide all subsequent strategic decisions. Final customers are usually too numerous to be organized, and when this occurs they are not included as partners in our model.

Flagship firms need to forge longer-term relationships with the non-business infrastructure in the community: universities, research institutes, community colleges, unions, trade associations and, most important, the various levels of government. These potential relationships are related to the principal strategies of the business network and focus on mobilizing the resources of the non-business sector to make the network as a whole more competitive. Here, too, the relationship between the flagship firm and the non-business infrastructure will be asymmetric. The flagship firm will provide the vision and leadership for strategic decision making (as it applies to the pertinent area of resource allocation and competency exploitation) and will mobilize financial resources for specific projects. The non-business network partner will contribute the non-financial resources – facilities and equipment, human resources, institutional arrangements – and will assume responsibility for implementation of the projects.

In terms of the role of the non-business infrastructure, Ouchi's (1984) view of Japanese trade associations, public-private economic institutes and government ministry "discussion councils" can be extended to the North American economies. He says that these bodies: "...in the end, serve the sole purpose of creating a setting in which competitors can arrange nonadversarial relationships for the common good. It is these institutions that are the loci of social memory. Each actor participates in many such institutions and thus knows that the future memory of his or her current behaviour will be stored, remembered and justly rewarded or punished." (p. 29)

Conversely, North American business interests typically characterize government as a source of friction whose presence and effect in the marketplace need to be minimized at all costs. If government is to be considered a contributing partner in a business-network relationship, then an approach more akin to Ouchi's description needs to be adopted. Indeed, the bureaucracies of government and other quasi-government bodies in North America also offer (a) a forum for co-operative exchange of ideas and (b) an institutionalized locus of memory. The onus of blame for the historically ineffectual relationship between business and government may just as easily rest with business. The convenient "government as interference" perspective does little to contribute to a co-operative environment. Further, the business community may continue to do itself a disservice by ignoring government as a repository of memory and as a facilitator of exchange.

The final distinctive feature of business networks is partnering relationships with selected key competitors. A range of relationships between competitors characterizes business networks engaged in global competition – e.g. joint ventures in third countries, technology transfers, supplier development and market-sharing arrangements. These partnerships differ from formal strategic alliances since they need to rely on joint working teams to elaborate and to implement the network's strategic purpose rather than depend upon formal contracts. There are both tangible and intangible benefits to this approach. The former come from traditional economic factors, such as economies of scale and scope. The latter are related to the cumulative nature of the competitive advantages that accrue from technology.[4] The network relationship with selected key competitors covers much of the same ground as the literature on strategic alliances.

3. A thorough review of the advantages and disadvantages of the more collaborative buyer-supplier relationship can be found in a paper by Lyons, Krachenberg and Henke (1990).

4. After this paper was drafted, John Stopford passed on to Alan Rugman in November of 1993 an unpublished paper, "Creating a Strategic Centre to Manage a Web of Partners" by G. Lorenzoni and Charles Baden-Fuller, University of Bath, June 1993. Their strategic networks framework is closely related to our business network in that they use the term "central firm" or "strategic centre" instead of flagship firm. Like the asymmetry that we propose, Lorenzoni and Baden-Fuller indicate that their strategic network should be led by a central firm in an asymmetric manner, although they do not explicitly use the term "asymmetry". The partners in the network include suppliers, customers and competitors but not the non-business infrastructure that we include in our model. Lorenzoni and Baden-Fuller also envisage a strategic network that is not geographically bound and that operates internationally. Lorenzoni and Baden-Fuller also discuss the importance of outsourcing and deintegration but not in terms of why a business network is an alternative to a hierarchy or a strategic cluster. They also mention trust and co-operation and the importance of interorganizational learning. As industry examples of their strategic networks, they list the business activities of Apple, Sun, Nintendo and Benetton.

Industry Structure, Clusters and Competitive Dynamics

In this section, we review relevant literature on the clustering and localization of industry so as to demonstrate that business networks (partnerships across borders) should not be confused with Porter's (1990) strategic clusters nor with industrial districts (on which there is a large body of literature). Rather, our treatment of business networks is differentiated (a) by its focus on international, interindustry relationships, as opposed to nation-bound intraindustry clusters and (b) by its view that networks can be designed to achieve an ongoing strategic purpose, as opposed to evolving haphazardly through "historical contingency".

Research into the theory of networks encompasses a wide range of academic disciplines, including economics, sociology and management. As so much of the discussion about networks must necessarily address personal relationships, ties and interorganizational relationships, it is not expected that the camps of industrial organization economics and strategic management emphasize different aspects of network formation.[5] The IO view says that industry structure determines competitive strategy, whereas the strategic management perspective is that industry structure is determined by competitive dynamics. It is important for both perspectives to be considered here in our discussion of the business network form of organization.

Many other writers discuss network forms of organization, leading to a great deal of ambiguity in the field. Networks can be separate and distinct forms of organization like the "networks" of Powell (1990) and the "hybrids" of Williamson (1991). "Strategic linkages", i.e. getting access to other firms' strategic capabilities by creating linkages or pooling resources, are discussed by Richardson (1972) and Porter and Fuller (1986). Nohria and Garcia-Pont (1991) suggest that the "strategic imperative" is sufficient to organize activity not in the market or in the hierarchy. The omission of transaction-cost-related arguments in most of this work is noteworthy. Again, papers in Nohria and Eccles (1992) explore the sociology of the organizational processes of networks but few of them do so from an international perspective. The narrow focus of this work has been compounded by the national "home base" diamond of Porter (1990). This sampling of the recent extensive literature on networks makes it important to understand where global business-network theory stands in relation to industry-level analysis of competitive advantage and, particularly, the work of Porter.

The business network developed above is fundamentally different from Porter's strategic cluster but his characterization of clusters is essential to an understanding of the nature of business networks. According to Porter, competitive industries in a nation will not be evenly distributed in the economy, but rather will consist of groups of industries that are closely linked to one another through vertical and horizontal linkages. These groups are termed by Porter to be strategic clusters of industries. As is well known, Porter's work has always emphasized industry-level determinants of competitive advantage (Porter, 1980, 1985, 1990). In Porter's (1990) work on the competitive advantage of nations, related and supporting industries in the home-base diamond of competitive advantage interact with industry rivals, industry-level demand conditions, and the natural and human resource conditions. Porter's strategic clusters are industry clusters. The organizational relationships of relevance would be intraindustry ones, rather than the interindustry ones of concern to us in our analysis of business networks. In Porter (1990) the case studies reported, and the empirical tests of the 16 strategic clusters, are all at industry level. The unit of analysis for Porter's (1990) strategic clusters is the same industry level as in Porter (1980), not firm level or business-unit level. Some scholars have criticized Porter's industrial organization view of strategy as a form of "environmental determinism" and a framework where "industry structure...is the primary determinant of the competitive rules of the game, and thus of firm strategy" (Bartlett and Ghoshal 1991, p. 8).

One aspect of strategic clustering is particularly relevant to our analysis. Such clusters tend to develop within geographic regions. Thus particular areas of a country will tend to sustain the development of specific clusters that will not be found in other regions. Furthermore, Porter's use of a "home base" diamond of competitive advantage means that his clusters are nation-bound, that is, all the partners come from a local region (such as small-scale ceramic tile makers or textile makers in Italy) with strong family ties and historical collaboration. Business networks, in contrast, are not geographically bound and include partnerships across national borders.

The localization of economic activity and the benefits of clustered industry have received extensive treatment by scholars other than Porter. Krugman's (1991) work on economic geography states that the location of economic activity is greatly influenced by "historical contingency", namely, social, cultural and political forces. Enright (1993, p. 20) characterizes this same theme by saying that "Economic development is an intensely path dependent process. It cannot be divorced from history...The skills and capabilities that firms develop are often rooted in local history." This statement is supported by the clustered industries so prevalent in Italy. In his discussion of the Emilia-Rogmana region, Brusco (1982) also provides localization explanations for the economic success of the region. Prominent in his determinations are social/political/cultural factors that can be traced back through the economic development of the region. These factors, for example, include the cultural orientation toward work, a long and proud history of artisanry and the structural power of trade unions.

In terms of the localization of economic activity, Enright (1993) highlights the advantages of local rivalry,

5. Some of these ideas are derived from private communication and discussion with Steve Tallman of the University of Utah.

demanding customers, skill development, etc. – the advantages of clustered activity characterized by Porter (1990). Enright also argues that these advantages are dynamic and more dependent on the information flow among individuals and organizations than on a particular geographic space. In fact, Enright appears to agree with Kogut and Zander's (1992) thesis about knowledge sharing being a determinative factor of organizational form and boundary. He proposes that information flow "ultimately determines the geographic scope of competitive advantage and the economic identity of regions" (p. 19).

The reasons for network development across borders are not simple. It seems that a productive approach to try to answer some of these questions is to examine "intentional networks" like our business network. This approach has the advantage of not viewing a network simply as a patchwork of strategic alliances and joint ventures. It looks at the network as a totality and a system that is created to accomplish a strategic purpose. From this perspective, it may be easier to discern the advantages and drawbacks of a network organization.[6]

Transaction Costs and Business Networks

In this section of the paper, we briefly review the literature on the organization of economic activity in markets and hierarchies which is relevant to our discussion of business networks. We proceed by discussing the limitations inherent in the size and bureaucracy of the traditional hierarchical firm. This discussion suggests that the environment of continual and rapid change in global markets has new implications for the efficiency of the hierarchy as a governance structure relative to business networks.

Williamson's framework (1975) for transaction-cost analysis has become the mainstream explanation in economics and management for determining whether particular activities or transactions should take place through market mechanisms or be conducted within a firm (hierarchy). The hierarchy is the preferred mediating mechanism when some form of market failure occurs or is anticipated, or, in other words, when there are significant transactions costs to doing business through market mechanisms.

The transaction-cost approach has been extended to explain the existence of the multinational enterprise through the development of internalization theory (Buckley and Casson, 1976). The MNE is organized to capture those aspects of its firm-specific advantages that cannot be protected in market transactions because of the substantial transaction costs involved, particularly those costs related to uncertainty and opportunism (Rugman, 1981, 1986). The MNE replaces market mechanisms with internal-governance mechanisms – organizational structures, systems and processes that ensure that its intangible proprietary assets are not dissipated. Still, these governance mechanisms are themselves not without cost (Williamson 1975, 1985). Both tangible and intangible costs are involved. The tangible costs are those related to the people and the communications infrastructure required to operate the governance apparatus. Intangible costs arise because individuals and subgroups within the firm may pursue objectives other than those of the firm itself, using guile and opportunism to further their own ends by turning the governance machinery to their own uses (Allison, 1971).

Williamson's work is particularly useful in explaining the emergence of large-scale enterprises (such as MNEs) that exceed the conventional scale-efficiency levels of their industry. Still, the limitations inherent in the transaction-cost-economics approach are being recognized in the literature on business networks. These oft-repeated criticisms include: (a) the focus on single transactions as the unit of analysis, an approach that ignores considerations of how repeated transactions and governance structures could be related in a more dynamic manner; (b) the assumption that economic actors are motivated only by efficiency, an approach that ignores governance structures that may be created or prolonged past their "efficiency" contribution, for reasons other than efficiency; (c) the assumption that these "atomistic actors" will behave opportunistically to further efficiency goals, an approach that ignores governance structures whose design and evolution have been influenced by trusting and co-operative behaviour.

Business networks arise as forms of organizing economic activity outside hierarchies and markets. There are two key reasons from a transaction-costs perspective. First, using the governance systems of large firms is costly because hierarchies often require elaborate formal structures, complex systems and procedures, and onerous reporting requirements to meet stakeholder concerns as well as organizational control. An example is the M-form, regarded by Williamson (1975) as a general case of hierarchical control.[7] In other words, the transaction costs of using the hierarchy to integrate complex value chains are substantial. This leads

6. Another unresolved theoretical issue relevant to the emerging theory of business networks and strategic clusters is the extent to which a new V-form organizational structure is emerging (where V stands for a business-network "virtual" corporation). There have been references to this type of structure in the popular business press (*Business Week*, 1993) but no significant analytical development on a par with the M form of Williamson (1975). To date, the term "virtual" corporation has been used to describe quite different situations. In some cases it refers to short-term, project-related linkages (e.g. Hollywood movie making); in others, it describes more lasting relationships to address numerous strategic objectives. Both uses of the term, however, depend upon accessing the resources and expertise of others. Conceptually, many of the external linkages discussed here, which need to be developed for a business network to be successful, can be thought of as a V-form organizational structure. But our V-form is asymmetrical, with the strategy of the flagship firm being that of the network and with the partners more responsible for its operational success.

7. Hedlund (1992) states that the N-form organizational structure of collaborative ventures is more representative of international business arrangements than is the Williamson (1975) M-form (multidiversional) structure. We agree and, indeed, would argue that the M form is now a special case of multinational enterprise activity, not the general case.

to the development of a network of subsidiaries (Bartlett and Ghoshal, 1989), or to the type of business network outlined earlier in this paper.

Large hierarchical organizations need internal organizational processes to implement their strategies; but, in turn, these structures are subject to governance costs and entropy. Entropy, i.e. the tendency toward disorder or degradation, is not limited to natural systems such as chemical or biological processes. Over time, large artificial constructs and systems also tend toward degradation. An example analogous to bureaucracies (hierarchies) is useful. Energy is put into building a stone wall. The wall is highly structured and ordered. Gradually, internal and external forces cause the wall to fall apart. Unless energy is applied constantly to maintain the wall, the original energy put into building the wall dissipates into the surrounding environment, and the wall becomes disordered.

Many large firms attempt to resist this entropic tendency by keeping the firm highly ordered. Unfortunately, today's competitive market environment increasingly penalizes firms with rigid structures. This rigidity limits interaction, communication, learning, innovation and the ability to adapt quickly.

The consequence of entropy on organizational structures is that large firms would need to expend energy in creating and maintaining structures and relationships (internal and external). The JIT inventory systems and lean production techniques of firms in the auto industry are examples of attempts to circumvent the limitations of the rigidity inherent in bureaucracy. Implicitly, the auto industry firms are diminishing the impact of this rigidity by tapping the competencies and resources of others and, in so doing, are changing the very structure that limited them in the first place. The new structure is part of a business network, a key point of which is linkages to the competencies and resources of others.

It is evident that large firms do experience these limitations of size. They spin off smaller subsidiaries; create new R&D labs; empower employees with more responsibility and autonomy; delayer their organizations; establish alliances and joint ventures; sell off business units to focus on core competencies; and so on. Once the cost of internal development of such competencies and resources is too high in the rapidly changing environments in which firms compete today, then business networks arise. Again, when the cost of staying in a status quo position is too high owing to (a) the wasted energy (time, money, human resources) required to maintain the structure and (b) lesser returns (adaptability, innovation) on the energy input, then business networks replace hierarchies.

Second, the market solution can be inadequate as well. Complex value chains require investment in proprietary assets that are difficult to protect through market contracting. There is an overwhelming need to build relationships based on trust – relationships that cannot be reduced to formal contractual arrangements because of the high degree of uncertainty and risk inherent in the business system (Ouchi, 1980)[8] This theory leads to the expectation that business networks will emerge in business systems involving complex value chains[9]. Many contemporary industries exhibit these characteristics (Miles and Snow, 1984). An excellent example is the automobile industry. Design, production and marketing of automobiles require a business system that is capable of efficient and effective organization of an extremely varied set of economic activities. At the same time, the volatility of the regulatory and market environment is extremely high, leading to high risk and uncertainty.

A Framework for Business Networks

Using a simple two-by-two matrix, we demonstrate that markets, hierarchies, strategic clusters and business networks can be defined by two axes: governance costs and the level of integration of the organization. Further, we explore the need for asymmetry in business networks as a means of reducing the governance costs that may arise owing to coordination outside the hierarchy.

The vertical axis of the matrix can be operationalized by consideration of transaction costs relevant to the level of integration of the organization. Complex organizational structures with a high level of integration experience opportunism, or asset specificity, or small numbers problems, or information complexity. A low level of integration is characteristic of organizations with a simpler structure; these have fewer transaction costs.

On the other axis, the "internal" governance costs of the organization exist in the sense of Coase (1937) and Williamson (1975). The governance costs of organization are greater for business networks than for hierarchies and are also greater for strategic clusters than markets. The reason is that business networks involve managerial relationships with "external" partners, i.e. there are intraindustry governance costs. In contrast, there are lower governance costs with an "internal" intrafirm hierarchy. Similarly the governance costs of a market with its "invisible hand" are lower than for strategic clusters with many external relationships that must be managed.

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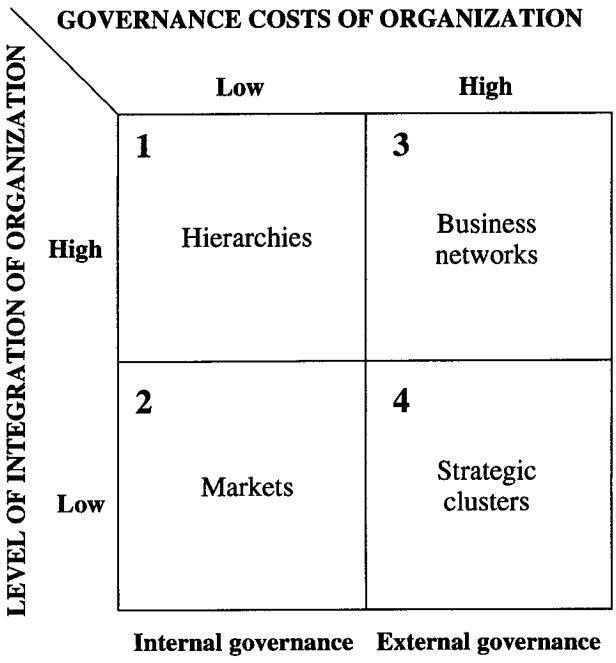
8. It is important to distinguish our concept of a business network from Ouchi's concept of "clans". Ouchi (1980) says that a clan will succeed when its informational requirements are satisfied by traditions and when its normative requirements are met by reciprocity, legitimate authority, and a set of common values and beliefs. While these attributes are useful in a business network, they are secondary to the vision generated by the flagship firm's commitment to a successful global strategy. In other words, Ouchi's clan system is a necessary (process-based) condition but not a sufficient condition for the success of a business network.

9. Ouchi's three modes of organization - markets, bureaucracies and clans - are transformed into four modes by Jarillo (1988), when he retains bureaucracies and clans but splits Ouchi's "markets" into classic markets and strategic networks, where the latter reflect co-operative, non-zero-sum relationships as opposed to zero-sum, adversarial relationships for the firm.

FIGURE 2

Governance Costs and Integration of Organizations



Quadrant 1, in an international context, is the multinational enterprise (MNE). Here governance costs are low but the level of integration is high, and hierarchies result – a process achieved by internalization. This occurs, for example, when the assets to be protected are intangible brand names, intellectual property or industrial know-how, or when buyer uncertainty must be overcome. Internalization leads to a firm-specific advantage for the MNE (Rugman, 1981). Historically, most MNEs have had a low degree of interaction with other firms and so have a lower degree of governance costs than firms with such relationships.

In quadrants 2, individual firms again have low governance costs (owing to the invisible hand) and have a low level of integration, i.e. they use the economist's neoclassical market. This occurs when the product or service can be produced efficiently at low scale, where few proprietary assets of an intangible nature are involved and where other opportunities for economic rents are absent. Often firms in quadrant 2 are small. A particular form of these circumstances occurs when governments impose on large firms costs that do not apply to small firms. A case in point is the Italian textile industry, which "deintegrated" from about 700 firms in 1951 to more than 9,500 firms in 1976 because the government enacted laws that taxed large firms at a higher rate than small firms, and exempted the smallest firms from onerous reporting requirements (Lorenzoni, 1982).

Quadrant 3 describes a business network. It deals with circumstances where the organization's level of integration is high, and where there are high governance costs (since there are reasons for external partnerships and linkages rather than internal organizational control). This situation occurs when firms find it necessary but efficient to deintegrate activities yet still attempt to coordinate strategy through long-term, co-operative relationships.

Quadrant 4 captures the case of Porter's (1990) industry-specific strategic clusters. There are geographically close linkages across a regional industry, whereas business networks involve non-industry partners and operate across national borders. In a "home-based" strategic cluster, two-way intrafirm linkages are possible, with a lower level of integration than in a business network. The asymmetry that is required in the more complex business network is missing in a local strategic cluster, which has fewer non-industry partners and therefore a lower level of integration. There does not need to be a flagship firm as a dominant player in a strategic cluster. Instead, in a strategic cluster, there is a two-way flow to the strategic process, as common industry characteristics are more similar than divergent.

Asymmetry and Credible Commitments

One of the drawbacks of moving to a business-network form of organization is that certain other governance costs, once minimized in the hierarchy, are likely to become meaningful factors. A good example is the potential increase in opportunism. The business network, however, has mechanisms to overcome opportunism. Specifically, we argue that the asymmetry[10] of the business network lessens the impact of such costs by increasing the credible commitments (Williamson, 1985) of the five partners. We propose that asymmetry is effective in:

(1) increasing interorganizational trust;

(2) increasing the stability of the network; and

(3) increasing interorganizational learning.

The first organizational benefit of asymmetry is supported by Ring and Van de Ven (1992). They posit that more lasting and high-trust relationships evolve from cumulative transactional experience. They also criticize transaction-cost economics for its flawed emphasis on single transactions, not repeated transactions - also noted by Doz and Prahalad (1991). Owing to the greater degree of transaction exclusivity in the business network, asymmetry facilitates easier accumulation of transactions and consequently the development of trust. Higher levels of trust lower transaction costs associated with opportunism, monitoring and enforcing agreements, loss of proprietary knowledge, etc.

In terms of the second benefit of asymmetry (increased network stability), we propose that asymmetry facilitates

10. We are using the concept of asymmetry in a different context than does Harrigan (1988). She explores the role of partner asymmetries (in relative asset size, national origin and venturing experience) in strategic alliances rather than in our type of business network. She finds that it is the purpose and the need for a co-operative venturing relationship which are most important to decisions regarding the use of strategic alliances. Less important to the survival, duration and success of a co-operative venture are the traits of the partners and their sponsor-venture relationship.

the permanence of shared interorganizational purpose (Luke, Begun and Pointer, 1989) through agreement on a narrower strategic agenda because it reduces dissension associated with competing strategic objectives. The permanence of shared interorganizational purpose thus increases the stability of the network. Borys and Jemison (1989) indicate that the sovereignty of hybrid (network-like organizations) partners is a constant threat to the stability and continuity of the hybrid. We argue that asymmetry facilitates stability by decreasing the sovereignty of partners in regard to those aspects of their businesses which are committed to the strategic purpose of the business network – or, at least, by negating the inclination of partner to protect their sovereignty by refusing to co-operate.

In regard to interorganizational learning, we propose that asymmetry assists the flow of information among the network partners. Because the business network has a flagship firm as its strategic focal point, it has a facilitator/coordinator to push the development of a "common language". Moreover, the strategic asymmetry obviates the need for the partners to protect their knowledge-based, firm-specific assets. Interorganizational learning is addressed in greater depth in a later section of the paper.

Powell (1990) recognizes the imbalances inherent in interorganizational relationships when one party is dependent upon the resources of another (others). But this imbalance is used to advantage through the pooling of resources. He supports the idea advanced by Kaneko and Imai (1987) that information relayed in networks is "thicker" than information received from the market and is freer than information communicated in hierarchies. As we have discussed, Powell admits that networks may increase transaction costs; but he suggests that such costs are bearable owing to such benefits as fast access to information, responsiveness to the market and reduced uncertainty.

In contrast to our arguments for the benefits of asymmetry, Miles and Snow (1984) warn against imbalance in interorganizational relationships. They state that dependence on a core firm (e.g. in a buyer-supplier relationship) is risky because the dependent firm loses the benefits of market participation. They argue that too much dedication/co-operation could cause the core firm to end up managing its partners' assets, to the extent that the network is converted into a vertically integrated firm. They emphasize the voluntarism of network members (the ability to enter into and to withdraw from unfairly structured situations) as an important network component. Their use of the term networks, however, encompasses a wide variety of interorganizational relationships, some of which are quite rudimentary.[11]

11. Similarly, Thorelli's (1986) use of the term network is "two or more organizations involved in long-term relationships". As an early writer on networks, Thorelli should be credited for the view that there is a rich and complex area of economic activity which is not suitably discussed in Williamson's (1975) discrete poles of markets and hierarchies. Quite correctly, Thorelli addresses power, influence and trust as key topics for inclusion in future network theory research.

The issue of close ties is raised by Perrow (1992) when he discusses small-firm networks and explicitly addresses the issue of dependent versus independent subcontracting. He argues that thick-waisted networks (networks with many producers between suppliers and customers, as opposed to production concentrated in several large firms) are a structural basis for co-operation. His multiple-tie network's advantages include sector/industry flexibility, stimulation of innovation, and sector-wide problem solving. Porter (1990) cites these factors as benefits of close geographic clustering of firms in an industry. In regard to dependent subcontractors, Perrow uses German industry as an example of many large firms, insisting that their subcontractors not become dependent on them because such dependence limits subcontractors' viability and health.

The opposite argument to that advanced by Perrow can be supported as well. It is open to question whether the aforementioned benefits result from multiple ties or from the nature of those ties. Perrow focuses on the structure but perhaps does not emphasize process enough. If the benefits accrue from the nature of the ties (longevity, trust, co-operation, sharing), then it can be posited that a reduction in the number of ties may not be detrimental.

Opportunism, Trust and Governance Structures

The relevance of arguments outside the transaction-costs school of thinking needs to be explored further to understand business networks. Therefore, we now discuss the issues of trust and social relations as they pertain to the efficiency of governance structures. The literature on these issues, on the whole, supports our belief that interorganizational relationships between autonomous organizations can be efficient, and that the five-partners model reduces opportunism. We contend that economic relationships that are embedded in mutually designed and formed social relations, i.e. the five-partners relationships, will lead to lasting, credible commitments. The following literature review lends support to our contention that the formation of governance structures is closely associated with the presence of trust. Moreover, it illustrates the differing schools of thought on the genesis of governance structures – particularly those that do not subscribe to a pure neoclassical model.

Although we argue that trust is an important condition for the successful development of network relations, we do not believe its presence is sufficient to guarantee an effective governance structure. Similarly, tightness of social relations alone is insufficient. Moreover, there is not necessarily a causal relationship between the tightness of social relations and the existence of trust, that is to say there are examples of long-term, tight social relations that operate in the absence of high levels of trust (e.g. unions, organized crime syndicates). Therefore, we argue that it is the strategic interdependence among the business network's partners which is the glue that binds social relations, trust and the efficiency of the governance structure.

Our understanding of the importance of social relations has been greatly assisted by Granovetter's (1985) thinking. But we extend his thesis by proposing that the structure of social relations need not be serendipitous. Rather, the molding of the selection procedures and the relationship structure within the five-partners framework maximize the efficacy of economic action. Granovetter approaches the organization of economic activity from a sociological perspective.[12] He proposes that economic action is embedded in structures of social relations, and that the analysis of the market/hierarchies question from this perspective generates a different understanding of the organization of economic activity. His key point is that social relations between firms can replicate the efficacy of hierarchies. Granovetter's thesis, therefore, is that efficiency of economic transaction is more dependent on the structure of social relations than on the organizational form in which transactions take place. Specifically, he claims that the reasons for internalizing activity within the hierarchy, such as to avoid opportunism and to create order, are a misplaced and simplistic adherence to the assumptions of the transaction-costs approach.

Hill (1990) takes a different tack from those authors whose point of departure in analysis is that opportunism is best kept in check through internalization in the hierarchy and through vertical integration. He is on a similar track to us when he questions whether the risk of opportunism has been overstated, particularly in regard to situations involving high asset specificity. Hill argues persuasively that the invisible hand of the market selects economic actors that behave in a co-operative manner[13] or, conversely, penalizes organizations that are opportunistic. Hill's argument illustrates the explanatory limitations of transaction-cost theory, specifically its inadequacy in capturing repeated transactions, the market's "evolutionary selection mechanism", and the emergence of "complex behavioural repertoires" in relationship-based transactions.

Support for network linkages is enhanced by an examination of those situations where co-operation fails to deal with opportunism, as identified by Hill: (1) when the certainty of outcomes is low; (2) when the reputation of parties to an exchange is difficult to establish; and (3) when the pay-off from short-term opportunistic behaviour exceeds the potential gains (discounted to the present) from future co-operation, which is jeopardized by that opportunism. Business networks with "rational contracting" (Ring and Van de Ven, 1992) explicitly promote co-operation in the above instances. The certainty of outcome and the reputation of parties are known to a much greater extent in such a network. Short-term opportunistic behaviour is curtailed because the health of the relationship and future gains are directly and explicitly linked.

A recent paper by Casson and Cox (1992) uses a 2X3 matrix to explain the move to network forms of organization. They use trust as the one axis in their matrix and "contractual economic principle" as the other. In their framework, low trust leads to markets (with external contracts), M-form firms or U-firm hierarchies. High trust leads to interfirm networks (external contracts), intrafirm networks (internal contract) and paternalistic firms. We agree that trust is important but is insufficiently causal on its own to warrant an axis in their matrix.

The organic and dynamic nature of business networks has been discussed by Ring and Van de Ven (1992), who view the emergence of relational contracts and governance structures as a dynamic process. In their discussion of the structure of interorganizational relationships, Ring and Van de Ven distinguish between recurrent contracting (short-term, low transaction cost) and relational contracting (long-term, high transaction cost). They argue that the evolution toward more lasting and high-trust relational relationships is a result of cumulative transactional experience and the associated degree of trust developed. We add to this point by arguing that it is the strategic interdependence of the asymmetric business network which facilitates the accumulation of these transactions.

In his study of subcontracting in France's small and medium-sized engineering firms, Lorenz (1988) examines interorganizational trust among project and industry partners. Of interest to us in the modelling of business networks are two of his conclusions: (a) Promoting trust is costly but lack of trust among "partners" is more costly. Lorenz found that, without the security of commitment in a long-term partnership, contractors were unwilling to invest in technology because of the volatility in their orders (from the partner). This lack of investment eventually harms the competitiveness of the contractor. (b) Trust can be created intentionally through the accumulation of transactions, not solely by "the shared values of community members" (p. 209). Consequently, efforts to build business-network partnerships need to recognize the importance of foregoing short-term gains so as to develop lasting relationships based upon trust. Lorenz's study lends credence to Ring and Van de Ven's (1992) assertion that cumulative transactional experience facilitates trust.

From this thinking, we derive the following three implications:

(i) the emergence of organic organizational process structures in a business network is dependent upon an understanding of why and how interfirm linkages form, evolve and dissolve;

12. Another perspective that can be classified as having a strong sociological contribution is that of Burt (1992). His work on structural holes, however, is not particularly relevant to our treatment of business networks, for its perspective is too micro-oriented in terms of relationships. Our paper's approach discusses interorganizational relationships from a macro level.

13. Hakan Hakansson and Jan Johanson (1988) give a broad overview of the use of formal and informal co-operation strategies in international business. They make the point that informal co-operation depends on trust developed through exchange, whereas, formal co-operation is often "negotiated" at a higher management level and often may not lead to real co-operation.

(ii) a successful business network is one where the transaction cost of opportunism is diminished by the simultaneous development of relational contracting process structures that can increase trust amongst the partners involved;

(iii) the organizational process of external linkages in business networks evolves in a dynamic manner and is more complex than the more discrete polar choices of markets or hierarchies.

Interorganizational Learning

The previous two sections stressed the importance of credible commitments as a means of decreasing opportunism and the costs associated with mediating its effect. Here, we integrate relevant recent literature on learning, skill development, and "codifying" knowledge. The intent of this section is to argue that interorganizational learning is not divorced from efficiency-based reasons for changing governance structures.

One of the fundamental assumptions in regard to communication within and among organizations is that internal communication must be less costly and more efficient than external communication. This assumption is predicated upon the convenient view that large organizations are monolithic in culture, norms and social values. If this is an extreme or exaggerated assumption, then it may be more prudent to argue that the parts of the monolith are more similar than dissimilar. In either case, it is customarily argued that internal procedures smooth the differences. This reasoning no longer reflects the complexity and diversity of the activities encompassed in a globally competing multinational. It would not be unusual to encounter divisions of a multinational which are more culturally diverse than they are similar (Bower, 1993). Moreover, the logic of this observation could be extended to conclude that parts of an MNE may have more in common with external organizations than with internal ones. Therefore, greater efficacy of intraorganizational communication (i.e. within the hierarchy) versus interorganizational through long-term relationships (network) is not a certain conclusion.

Kogut and Zander (1992) challenge the pure-transaction-costs perspective, which reasons that internalization is driven by the need to protect against opportunism. Like Granovetter (1985), they believe that knowledge (and, therefore, economic relations) is embedded in the social relationships in the firm. Kogut and Zander argue that the distinguishing raison d'être of firms over markets is that firms share and transfer the knowledge of both groups and individuals within an organization better than markets can. The authors believe that the boundaries of the firm, or as we discuss a network of firms, are defined by how well knowledge is generated from current capabilities or from recombining them. Knowledge is organized by "codifiability" and "complexity", and such organization facilitates its sharing as a common language. This sharing is dependent upon an understood code or language within the organization which has been created partially by the social relationships in the firm. Kogut and Zander suggest that using the transaction as the unit of analysis of organizational capability ignores the impact that social relations have on knowledge and capability.

As with Ring and Van de Ven's (1992) theory of relational contracting, Kogut and Zander (1993) lend credence to our belief that learning within the business network can be effected just as it is within the firm. Powell's argument (1990) also supports our approach, for he believes that the process of knowledge and skill learning is enhanced through the relational, open-ended features of networks.

Hamel (1991) stresses the importance of interorganizational learning. He argues for analysis of "the process of knowledge acquisition and skill building" (p. 83) and he emphasizes asymmetries in the skill endowment of firms, leading to efficiency-based reasons for collaboration and interpartner learning. Porter's industry-based, competitive strategy paradigm, with its product-market positioning, has been criticized by Hamel as a focus "on only the last few hundred yards of what may be a skill-building marathon" (p. 83).

It is evident from the research into knowledge sharing and capability development that organizational learning plays an important role in determining how economic transactions are organized. We believe that the success of the business network is dependent, to a certain extent, on organizational learning. Eventually, it is expected that the network will develop its own shared language or means of organizing and transmitting information. The boundaries of the flagship firm, therefore, are open to change as the business network evolves and "matures". For example, if the flagship firm and several research institutes in the non-business infrastructure gradually become more adept at sharing information and resources, then the flagship firm's boundaries, effectively, will have been shifted.

In terms of the five partners model of the business network, this implies that skill development must be a more robust process if effected through interindustry linkages rather than intraindustry linkages. As with cross-functional learning, cross-industry learning is more likely to add to an organization's pool of knowledge than are the diminishing returns from intraindustry knowledge sharing. Asymmetry, thus facilitates interindustry learning among partners by increasing credible commitments and reducing the need to internalize knowledge-based, firm-specific advantages.

Conclusions

In this paper, we have developed the five-partners model of a business network. This model of organizing exchange through long-term, co-operative relationships is a contribution to the traditional market-hierarchy dyad. We related

our new model to the discussion of networks in the management field and improved upon the vague definitions used in much of the literature. We have argued that our business network represents a new form of governance structure; it is not merely a firm with several alliances nor is it one with just a key supplier program. The business network is distinguished by asymmetric strategic leadership by an MNE of the network's five partners. We argued that the asymmetry increases credible commitments and thereby plays a valuable role in increasing interorganizational trust, the stability of the network, and interorganizational learning. In a well-functioning business network, asymmetry reduces the need for contractual exclusivity with suppliers owing to the credible commitments it produces.

We have integrated relevant concepts from the mainstream literature on international business, strategic management, economic geography and sociology. In particular, we have drawn together three key ideas: the costs of opportunism and asset specificity in exchange transactions; the embeddedness of economic action in structures of social relations; and the codification of knowledge in a "language" to facilitate interorganizational learning. Through the integration of these three ideas, we found that the business network is an effective governance structure that recognizes the realities of economic exchange and social relations in an imperfect world.

For an understanding of business networks, it is important that social relations be considered explicitly in the formation of governance structures, and not simply be dismissed as "frictional matters". It is becoming apparent that skill development and continuous learning will play key roles in economic competitiveness into the foreseeable future. The changing shape of the MNE through deintegration suggests, therefore, that interorganizational learning must be better understood. The economic competitiveness of firms is becoming less a matter of exploiting sheer size and market power advantages, and more one of capitalizing on business network flexibility and adaptability. These latter traits, when combined with competitiveness in leading technologies, can be a potent means of achieving overall firm competitiveness.

New governance structures have significant implications for the role of management, especially in the global context of an MNE's operations. These implications have been discussed by Rugman and D'Cruz (1991) and D'Cruz and Rugman (1992) in their treatment of strategic clusters and business networks in a Canadian context. Senior managers working for the flagship firm of a business network need to broaden the scope of their strategic thinking. They must understand how each of the partners contributes to the international competitiveness of the business network as a whole. Moreover, they must broaden their perspective of control and competition to include sharing and co-operation. In terms of public policy, the development of business networks presents challenges to the role of government, particularly in regard to antitrust and competition policy. Second, government and business need to determine whose role it is to lead the industrial strategy process. This paper makes clear our belief that MNEs must assume this responsibility. In terms of further research, the authors are studying the telecommunications industry in Canada; see D'Cruz and Rugman (1994).

In the future, we will need to devote even more attention to the growing importance of business networks and their new interindustry organizational linkages. We can gain new insight into corporate strategy by expanding the international management perspective from internalization theory and transaction costs to a consideration of the role of business networks as an organizational form that plays an important role in globalization and that creates "partners across borders".

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