

# **Globalization: The Evolution of Enterprises in the Global Network Competition**

**Thomas Borghoff**  
University of Dortmund, Germany  
44221 Dortmund  
Tel.: 0049-231-755-3460  
Fax.: 0049-231-755-5228  
E-Mail: [t.borghoff@wiso.uni-dortmund.de](mailto:t.borghoff@wiso.uni-dortmund.de)

**Prof. Dr. Martin K. Welge**  
University of Dortmund, Germany  
44221 Dortmund  
Tel.: 0049-231-755-3148  
Fax: 0049-231-755-5228  
E-Mail: [welge@usw.de](mailto:welge@usw.de)

## **Abstract**

The globalization of a company is embedded in the globalization of its task environment. This process can be described as a co-evolutionary process of a social system in its environment. A historical view of the globalization of competition seems to prove that it can be interpreted as an evolutionary process of differentiation and integration that is reinforced by the decreasing rigidity of boundaries. A „liquefaction of competition“ can be observed, in which an increasing number of autonomous economic actors like decentralized units of Multinational Corporations (MNCs) and Small and Medium-Sized Enterprises (SMEs) are competing and cooperating in the global context. As a result, a „network competition“ is emerging, which can be traced to an increasing expansion and density of economic and other social interactions. The competence of networking on a global scale thus becomes a central demand in the process of globalization.

The globalization of competition can be defined as a feedback-loop, in which companies strive for competitive advantages by global differentiation and integration of their activities and products and thereby reinforcing the increasing demand for competences in global competition. This feedback-loop is marked by increasing dynamics, so that the competence to cope with the evolutionary dynamics of globalization becomes the second central demand for management. A management of globalization thus should be based on three elements: the classical competence of internationalization in the sense of building up international business activities, the competence of global networking and the competence of evolutionary dynamics.

## **1. The Globalization of Enterprises**

The comparatively young discussion of *globalization processes* is embedded in a long tradition of scientific discourse in the field of international business activities. „The wealth of nations“, written by Adam Smith (1776), might be regarded as a first milestone in a long line of explanatory approaches to international trade and business activities. Yet, until the sixties of the last century the discourse in the field of international business activities was restricted to explanatory approaches of the *existence* of such activities.

The „take-off“ in International Business which developed in the aftermath of the second world war, especially since the fifties and sixties, led to an increased need for concepts to actively handle and organize international activities from a management point of view. Technological and societal developments led an increasing number of industries towards the road of globalization. Companies within these globalizing task environments got into the feedback-loop of adapting to globalization demands on the one hand and thereby reinforcing the globalization on the other. Competition in this respect provides the mechanism for the feedback loop, in which companies have to strive for competitive advantages by global differentiation and integration of their products and activities while at the same time this results in ever increasing demands for the competences in global business. The feedback-loop of globalization thus seems to induce a self-reinforcing dynamic force which later will be described as the main challenge to the management of the globalization process of individual firms.

A noticeable intensification of research especially in International Management can be observed since the eighties. Beyond the explanation of the existence of International Business and of patterns of internationalization processes, the management point of view increasingly has been taken into account. To get a grip on the management of internationalization, research has been conducted on strategy and organization of MNCs. The focus moved from a basically static orientation in the seventies (strategy content and organizational structure) to processes of organization and of strategy development since the eighties. An area still neglected is the study of the dynamic force of globalization itself and its implications for International Management.

Of course, the development of *research* in the field of globalization processes cannot be adequately appreciated without the illumination of the developments of the observed *phenomena*: the globalization of competition and the globalization of the individual enterprise. The two phenomena are linked in a dynamic interplay which is embedded in the wider context of the globalization of society. Globalization can thus be conceived as a phase in the historical evolution of society as a social system.

In this paper, a dynamic perspective on the globalization phenomenon shall be acquired to extract some insights in its implications on the management of the globalization of individual firms.

The fundament for a chosen observation has to be provided by a distinction. For an observation of the movement or development of an object a background is needed – the environment of the object. To observe and measure the race of a runner you need a track. So you choose a stable and observable underground and define the start and end of the race track which is linear. So what kind of background should be chosen for the observation of the globalization of a company? Obviously, a more differentiated perspective to the observed object and its environment has to be developed. In order to allow the transfer of already existing theoretical concepts which might provide some insight into the globalization process of firms, these will be conceived as organizations in the sense of social systems. Based upon this definition, knowledge from dynamic Organization Theory (e.g. Institutionalization Theory), Evolutionary Theories and the Theory of Social Systems itself can be transferred to derive a dynamic view of „globalization management“.

A historical view of the evolution of competition will be outlined in the following chapter in order to develop consequently a dynamic perspective to the globalization of the chosen object „organization“ in its environment. The evolution of individual companies will be described as deeply intertwined with the evolution of its social, especially the competitive environment. The above mentioned theoretical concepts will be analysed in search for orientational knowledge for the globalization of organizations in the third chapter. A social system based view of organisational globalization processes will be compared with existing internationalization theories.

## **2. Globalization as a Historical Process**

In the following chapter shall be developed a fundament for an analysis of the driving forces of economic evolution and its inherent dynamic forces from a historical point of view. The increasing interconnectedness and interdependencies of actors and actions in global competition should not be regarded only in terms of an isolated stage or „quantum leap“ of competition which has been taking place during the last two or three decades. It is as well just part of the historical process of continuous social differentiation and integration.

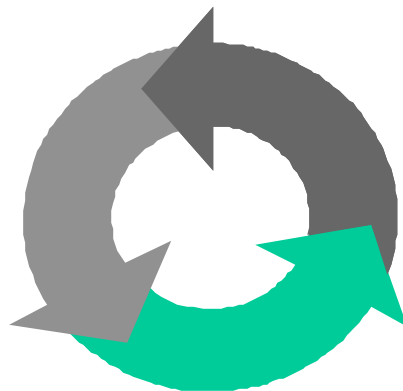
Analyzed on the basis of the dynamic „Theory of Social Systems“ (Niklas Luhmann 1984), globalization can be viewed as a phase embedded in the social and hence economic evolution. In this concept, social evolution is conceptualized as a process of continuous functional

differentiation and integration of social systems. The distinguishing feature of this phase in social evolution is that the evolutionary principle of social differentiation and integration is principally not any more restricted to national or cultural boundaries but globalizing in different functional systems like science, religion, economy, or politics. Because of the technological and social development in recent decades, especially the economic system (e.g. as compared to the political system) has become extremely independent of national or regional boundaries. The result is a process of increasing differentiation and integration on a now principally global basis. Some industries become very integrated (like the automobile industry) some increasingly differentiated (like leisure or communication industry). The same process is also observable on the individual industry-level. In the automobile industry, for example, there is an integration of production but at the same time a greater variety of products.

The described process of differentiation and integration can not be controlled by an individual actor. There is a „structural coupling“ between a system and its environment and therefore an interplay between the differentiation and integration processes of both. Figure 1 shows the dynamic interplay between the globalization of a company and its task environment.

The result of the self-reinforcing feedback-loop of globalization is the „most famous management problem of the century“: increasing global complexity and dynamics, reinforced by the diminishing importance of national, cultural and cognitive boundaries. The possibilities for differentiation and integration are potentialized. The success factor „time“ therefore becomes more and more important. The faster a company can identify and open access to new chances in its respective task environment, the sooner it can build up competitive advantages. In order to draw a clearer picture of the described process of co-evolution in global task environments, a historical perspective on global competition will be developed in the next chapter.

Globalization of the task environment



Globalization of a company

Figure 1: Co-evolution of a company in its task environment

## **2.1 Evolution of World Competitive Structure in the 20. Century**

The globalization of society and especially of the economy is not a new phenomenon, which has just been evolving during the last two or three decades and which is sometimes attributed with a somewhat metaphysical character. On the contrary, it should be regarded as a natural process of social evolution. As early as 4.000 years ago there was an evolution of corporate

structures in and around ancient Assyria, which nowadays might be termed „multinational“ (Moore/Lewis 1998).

Particularly the technological innovations during the last decades led to a significant dynamization of the process of the international expansion of business activities and their interdependencies. To convey an impression of the „competitive playground“, on which corporate evolution takes place, a short overview of the three most important stages in the evolution of the competitive structure in the world economy during the last century will be presented in the following (according to Jarillo/Martinez 1989: 504; Porter 1993: 71-73, Macharzina 1993: 30-32).

The roots of this stage model can be traced to the „Process School of International Management“. Strategies and organizational forms are termed according to the underlying pattern of international, multinational, global and transnational management orientations. Jarillo/Martinez identify three stages of international competition since 1920 based upon this pattern. This stage model shall now be used to convey a more detailed picture of the evolution of competition in the age of quantum-leap globalization. Competition before 1920 is not described explicitly because international business activities in this time were very limited and appeared only in the form of overseas trade. There were only comparatively few foreign subsidiaries (apart from trading houses). Protectionism and high transaction-costs, primarily because of simple communication and transport technologies, permitted only a low profitability of international business. An exception was colonial trade in which high profits were generated. It was also used to get hold on resources. The need for „international management“ was very restricted because of low foreign direct investment. The necessary control of the existing subsidiaries was often based on kinship and not on professional management. The importance of international management developed after 1920, when new technologies allowed for a rising international trade volume. The time since 1920 can roughly be divided into three stages to demonstrate the importance of the evolutionary mechanism:

▶ □ Stage 1: multinational, 1920-1950

This stage of competition was characterized by a strong national focus. The reasons can be attributed to a high protectionism, national differences and particularly to high transport and communication costs. Foreign subsidiaries of international companies were widely autonomous and with very limited specialization and exchange activities. Generally, the relation between headquarter and subsidiaries was only defined by the transfer of profits.

▶ □ Stage 2: global, 1950-1980

Based upon technological progress and a liberalization of markets, the advantages of the global integration of business activities grew significantly. Particularly new technologies led to increasing economies of scale which could also be transferred to the market due to sinking transport and communication costs.

In contrast to the multinational stage with international transactions on a more or less pure market basis, the global stage offered profits by integrating value-added activities (particularly upstream) and by a centralization of the international organization structure. The global stage was marked by growing interdependencies of markets as well as between the subsidiaries of MNCs. Another characteristic of this stage was the development of global market segments and the formation of globally integrated MNCs, which exploited global interdependencies by integrating their own activities on a global basis.

▶ □ Stage 3: transnational, since 1980

In important global industries large increases in economies of scale have slowed down because of technological limits. The development of flexible production technologies led to a rising efficiency of the production even of smaller quantities. Strategies of global standardization in many industries no longer are the main option for efficient business

activities. An increasing market fragmentation leads to a growing attractiveness of a more flexible and differentiated handling of important dualities in International Management like „global versus local“ or „system versus environment“. The latter is of increasing importance because the development of „*network competition*“ in the transnational phase is accompanied by a relativation of boundaries. Not only cultural and market boundaries lose their rigidity; particularly organizational boundaries become increasingly blurred. The globalization leads to a continuous integration of global markets and competition.

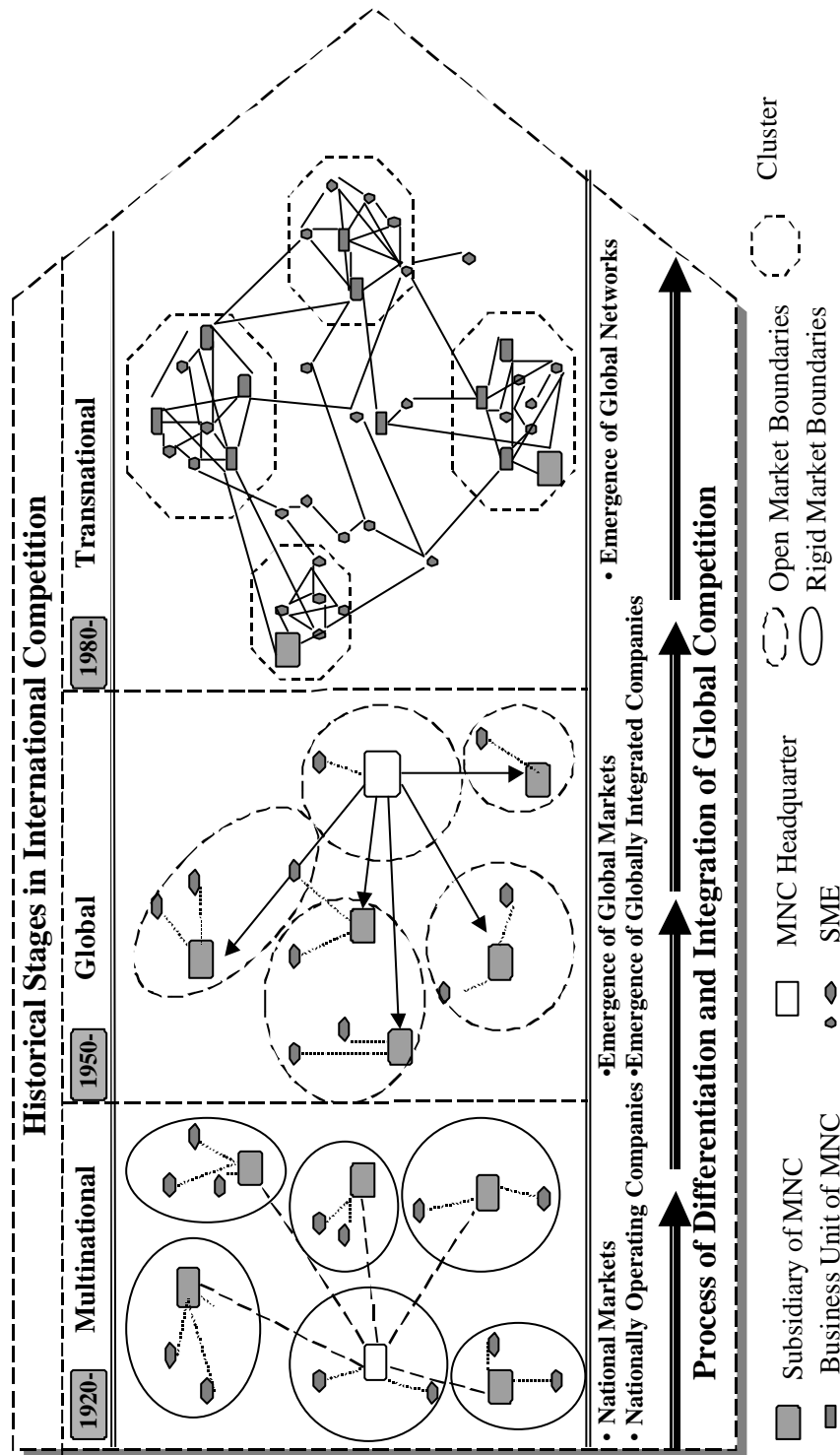


Figure 2: Historical development of global competition

Isolated hierarchical and market instruments do not suffice to confront the differentiated demands to organizational evolution caused by the increasing intra- and interorganizational interdependencies in global competition. Companies with international operations develop network structures by internal differentiation and by cooperation. This leads to a greater density of interdependencies in global competition. Companies put into perspective the rigidity of their boundaries and develop new organizational arrangements not in the classical reactive tradition („structure follows strategy“) but in a more flexible way by grouping organizational arrangements around their core competences.

As mentioned above, the globalization process leads to a kind of „*liquefaction of global competition*“, resulting in a higher density of interdependencies and interactions between a rising number of globally acting players. In International Management the traditional view of MNEs as big global monoliths and SMEs as relatively isolated niche-specialists has to be changed in a context in which smaller MNC-subunits with greater autonomy and globalizing SMEs are on the way to build up interdependencies on a world-wide basis. Particularly the new, „less physical“ industries have demonstrated, that the classical concepts of internationalization and organization have to be supplemented with more flexible, network-oriented and evolutionary concepts.

Figure 2 illuminates that the globalization of competition is not only marked by a fading rigidity of boundaries, but that it has to be observed in the context of the evolutionary processes of social differentiation and integration which is now expanding to the maximum level of regional extension. Lübbe (1996: 46) regards globalization as a process of world-wide network-creation. According to Lübbe, the civilizational evolution can be described as a „process of increasing geographical and social expansion of economical, political and cultural interactions“ (Lübbe 1992: 47). The intensity of interactions is expected to be increasing simultaneously to their expansion on global scale. According to Lübbe, network extension and the increase of global network density go hand in hand. Based upon these thoughts, Lübbe derives the following heuristic (Lübbe 1996: 51):

*„With the increasing density of networks, the disadvantages of not being connected to them rises erratically.“*

During the multinational stage, the global structure of largely isolated national markets demanded only relatively simple coordination modes of economic activities like simple hierarchical structures and local markets with only a few global interdependencies. Due to the emergence of global markets and the changed conditions during the global stage, globally integrated, complex hierarchies had to be developed to exploit the typical competitive advantages of this stage.

The continuous expansion and rising density of global competition in the transnational stage induces the deployment of complex bundles of hierarchical, heterarchical, and market-based mechanisms in international management. The density that has developed in various industries led to the outstanding importance of the competence for participation in and construction of global networks as *the* critical success factor in global business.

## **2.2 Implications for a Management of Globalization**

As it has been argued, the evolution of global competition has been marked by growing expansion density. The underlying evolutionary dynamics seem to gain velocity during this „quantum leap“ of global competition. Companies can strengthen their ability to identify and define their position in this process by adopting a „global orientation“ on their operations (Böttcher 1996: 42-50). Globalization should not only be viewed on the basis of the international expansion of activities. Instead, the observation of globalization processes a company follows, should contain the following three dimensions (see also Figure 3):

- ▶ Development of global business activities (competence of internationalization)
- ▶ Development of global networks (competence of networking)
- ▶ □ Global corporate transformation (competence of evolutionary dynamics)

These three dimensions vary in their importance depending on the state of development a company faces. Following the „Stage Models of Internationalization“ (Johanson/Vahlne 1977, Luostarinen 1979, Cavusgil 1982), it could be argued, that the development of the competence of internationalization is of particular importance for companies at the beginning of their globalization process but decreasing during the process of organizational learning and institutionalization of internationalization knowledge. On the contrary, the acquisition of the competence of networking is of increasing importance during the process because of a growing international complexity in organization structure and operations.

The „development of international business activities“ focuses on individual activities that serve to build up and expand the activity structure in international markets. As a result appears a „configuration“ (Porter 1986) of internationally dispersed activities. This component has traditionally been researched on the basis of explanatory approaches in form of „Internationalization Theories“. The „*competence of internationalization*“ therefore includes knowledge in market entry and selection modes, or the development of a local standing. This competence is of particular importance during the first stages of globalization. During the course of internationalization, institutionalization of this knowledge in organizational routines and structures leads to decreasing marginal returns on this competence at least compared to the increasing returns on the „*competence of networking*“ that gains importance with the increasing international differentiation and extension of activities that the internationalization process produces. As described above this competence might also be regarded as the critical success factor in the emerging „network competition“ of today’s global markets. In this new form of competition, the competence of networking can as well be used for the internationalization process. SMEs, for example, do not have to internationalize by developing huge international company structures as the only option, like MNCs had to do

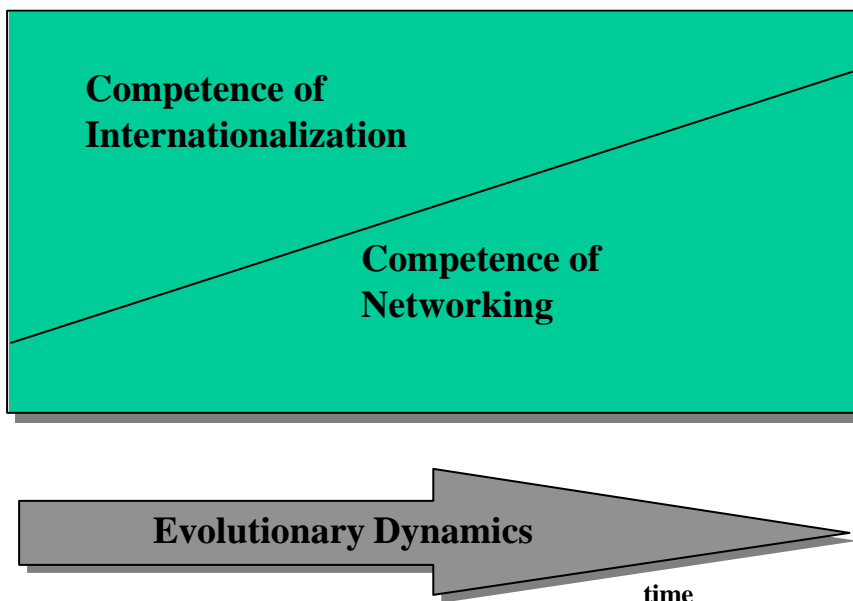


Figure 3: Management competences of globalization

in earlier stages of global competition. SMEs, and autonomous business units can internationalize by building up international network relations. Network structures gain their advantages from selective specialization and their flexibility in the formation of complementary activity structures over time. This is a clear advantage compared to individual companies that are plagued by sunk costs and organizational inertia. The characteristics of networks might on the other hand lead to a negative influence of time in form of destabilization. Each organizational form therefore has to cope with the evolutionary dynamics that are inherent in globalization. These dynamic forces *are* the processes of differentiation and integration in social systems, that currently are on a quantum leap to global extension. A management of the evolutionary dynamics in global corporate transformation therefore has to be focused on the dynamic balance of this systemic core difference. During the globalization process of a company, organizational units and activities are differentiated in global as well as in local and cultural contexts. Each differentiation therefore leads to very idiosyncratic relations of the differentiated organizational subsystem and its respective environment(s). The dynamic management of boundaries as well as of the relations between internal and external subsystems becomes a core competence in international management. This makes a clear boundary and self-definition important. Companies increasingly have to cope with „dualities“ and paradoxes (Evans/Doz 1992, Cameron 1986, Wiesmann 1993). In international management the popular duality „local responsiveness versus global integration“ has widely been discussed. Another duality in the new „*network-competition*“ is „stability versus flexibility“. Many MNCs have to develop more flexibility by forming smaller and more decentralized units, whereas SMEs have to get access to international networks mainly by cooperation. Both have to build up new competences in order to adapt to the new form of competition on a global basis which demands more and more the organizational complexity (intra- and interorganizational) to deliver and to use the profits of both ends of a duality. The following Table 4 shows the respective qualities of MNCs and SMEs to cope with developments in the increasing

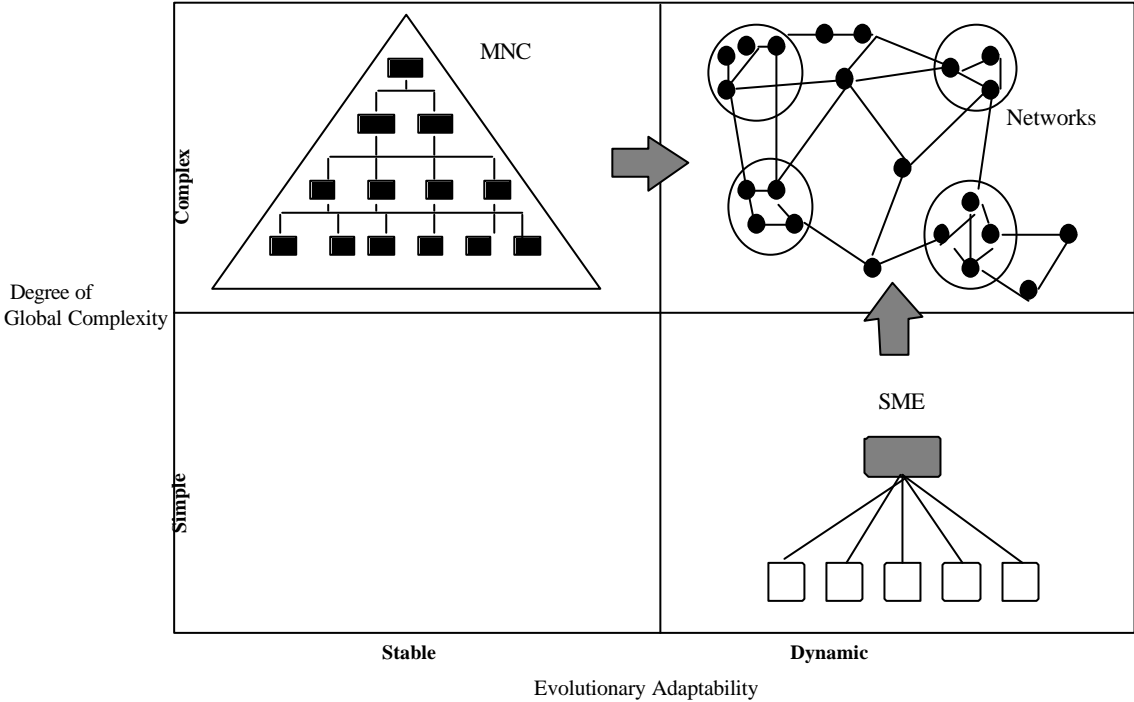


Figure 4: Network-Building of MNCs and SMEs



„*network-competition*“ .

MNCs and SMEs have a nearly opposite starting point with regard to the development of „global network fitness“. MNCs have institutionalized international management experience in organizational routines and structures yet. They have access to internationally dispersed information and resources. They have learned the lessons of internationalization in the sense of developing international business activities (market selection, market entry and development processes). The global network competition now demands a balancing of these traditional advantages of MNCs with the advantages of flexible autonomous subunits to strengthen their competence of networking.

In contrast, most SMEs yet have to develop the competence of internationalization because of limited international engagement. On the other hand, they can develop the competence of networking right at the beginning of their globalization process. Particularly new industries in the service and software sector show the great possibilities of intra- and especially interorganizational networking. This enables even start-ups to globalize rapidly without the development of vast organizational hierarchies. These young industries also show the increasing importance of time and therefore of evolutionary dynamics in competition. It does not seem to be happening by chance, that the key dimensions of globalization are of particular significance in the youngest sectors of the history of global competition.

### **2.3 Summary**

A historical and evolutionary view leads to the observation that globalization not only means a decreasing role of the rigidity of boundaries, but as well an expansion and increasing density of global competition. The result is what was described as a „*liquefaction of global competition*“. The competence to construct and take part in international networks thus becomes the central success factor in International Management. Companies that are trying to build up and develop global business activities have to cope with the possibilities and restrictions the „*network-competition*“ takes on them. New activities can be built up according to the demands this new competition poses without having to follow the traditional internationalization paths and resulting sequences of intensive reorganization. The traditional core business normally can not escape such a reorientation in a rapid and deeply changing environment. A management of global company evolution should be based on the key dimensions of globalization. Competences have to be developed in the management of internationalization, networking and globalization dynamics. MNCs and SMEs in this respect have very different starting points, particularly in the development of network fitness on a global scale.

In the following chapters, theoretical concepts shall be examined for some insights, how the described characteristics of the globalization process of competition can be used to find some clues for the management of a company's evolution. In a first step, internationalization theories will be examined for their potential contribution to orientational knowledge on this subject.

## **3. Internationalization Theories**

### **3.1 Explanatory approaches for the existence of international business activities**

Research in the field of internationalization at first was primarily driven by the question for the existence of *international trade activities*. The theories of absolute cost-advantages (A. Smith 1776) and comparative cost-advantages (Ricardo 1817) as well as the Factorproportion-Theory (Heckscher 1919, Ohlin 1933) and the Neo-Factorproportion-Theory (Leontief 1956) deliver explanations for the existence of international trade on the

basis of different national cost positions and factor-endowments. Their premises are of a static nature and are based on macroeconomical reasoning. Particularly the presumption of immobile production factors prohibits an investigation of globalization processes.

Theories of Foreign Direct Investment mainly were developed in the tradition of the Industrial Organization School. They are founded on the assumption that the reason for the existence of FDI and therefore of MNCs can be attributed to the existence of market failures. The fundament of this efficiency-oriented theoretical tradition was laid by Hymer (1960) and culminated in the development of three distinct theoretical lines of argumentation. These theories were integrated by Dunning (1977) into the Eclectic Theory which comprises the Theory of Monopolistic Advantages, Location Theory, and Internalization Theory.

This theoretical framework delivers a quite comprehensive rational explanation of internationalization. The basic assumption of an homo oeconomicus permits a basically static and efficiency-oriented reasoning. A process perspective thus cannot be conveyed.

### **3.2 Incremental Stage Models of Internationalization**

A first approach to explicitly integrate the time dimension into Internationalization Theory was developed by Vernon (1966) with the concept of the International Product Lifecycle. Vernon for the first time developed a processual view of international business activities, with the description of a typical international diffusion process of products, which comprises four stages. Criticism aside, Vernon constructed a quite pragmatic and comprehensive model which integrates explanatory, processual and environmental variables. The dynamic force itself and its implications for International Management are not explicitly mentioned.

The first linear stage model, the „*Behavioural Theory of Internationalization*“ was developed by Aharoni (1966). Like in the „*Behavioural Theory of the Firm*“ (Cyert/March 1963), a company is conceived as a political coalition of different interest groups. Consequently, Aharoni focuses on decision processes of foreign direct investment under conditions of bounded rationality, uncertainty and diverging interests. Satisficing instead of maximizing solutions thus are assumed to be found in the decision processes. For the first time a behavioural point of view was taken on internationalization.

Based upon the „*Behavioural Theory of the Firm*“ (Cyert/March 1963, Aharoni 1966) and on the „*Theory of the Growth of the Firm*“ (Penrose 1959) three different schools of research on internationalization processes developed in the seventies:

The Uppsala School conceives internationalization as a process of incrementally expanding engagement in international business. This process is conceptualized as a dynamic interplay between static aspects of internationalization (market commitment, market knowledge) and aspects of change (current business activities, commitment decisions) (Johanson/Vahlne 1977: 26). International business activities are assumed to develop first in countries with a short „*psychic distance*“ and to expand incrementally into countries with a larger one. Causes of psychic distance might be the language, culture or industrial development (Johanson/Wiedersheim/Paul 1975, 306 f). Of particular significance is the concept of knowledge in the Uppsala-model. Along the internationalization process experience and knowledge in international operations are organizationally learned and institutionalized in decision routines and organizational structure. The perceived risks and costs of international activities are consequently sinking along the process.

Similar to the Uppsala-model, the Helsinki-School conceives internationalization as an incremental process with four central stages, beginning with a stage of rudimentally organized international operations without foreign investment and culminating in the fourth stage of extensive foreign direct investment. A central concept of the Helsinki-model is the „*lateral rigidity*“ in decision-processes which represents the general aversion to new ideas and their adaption in organizations. This concept has its roots in the behavioural model of decision-making (Cyert/March 1963): limited perception → restricted reaction → selective search →

limited selection. Lateral rigidity affects each stage of decision making, so that the prospects for innovative concepts are diminishing from stage to stage (Luostarinen 1980: 33ff). Particularly, strategic decision-making is supposed to be affected by lateral rigidity. Organizational learning along the internationalization process leads to a decreasing rigidity in its course, similar to the diminishing risk- and cost-perception in the Uppsala-model. The latter's concept of „*psychic distance*“ finds its analogy in the „*business distance*“ of the Helsinki-model with the same implications for the internationalization process. Because of their similarities and their conceptual closeness both Scandinavian schools are together termed as the „Scandinavian School“ by Buckley/Ghauri (1993).

In contrast to the „Scandinavian School“, the approach of the Wisconsin-School does not cover the development of the whole range of international business operations up to foreign direct investment in production facilities. Instead, a concentration on the development of export activities is preferred in a more differentiated stage model of export activities. The basic model goes back to Rogers (1962: 81-85) and comprises six different stages from stage one (no export activities) up to stage six (extensive export activities). Bilkey/Tesar (1977: 95) assume that the development of export activities is accompanied by a process of continuous learning. According to the authors, also a change in values and perceptions of management can be observed along the intensification of export activities.

Cavusgil (1984) later tightens the model to five stages: domestic marketing – pre-export stage – experimental involvement – active involvement – committed involvement. For each stage, Cavusgil then identifies conditions for a successful engagement. As a condition for „active involvement“, Cavusgil mentions the access to key resources and the commitment to invest them internationally. Cavusgil also defines a critical activity for each stage, like an optimal international resource allocation for marketing activities during the last stage of „committed involvement“. As the strongest influence on the internationalization behaviour Cavusgil identifies the values and expectations of decision-makers. Under inclusion of other variables (differentiation advantages, preparation intensity) Cavusgil (1984: 13ff) verifies this thesis by empirically testing ideal profiles of active and passive exporters. This result was confirmed in a study of Bamberger/Evers (1996: 274), who developed ideal profiles according to the stage model of Cavusgil. The study was based on the results of an empirical research project by the STRATOS-Group (1990) on the internationalization behaviour of companies in eight European countries.

### **3.3 Discontinuous Stage Models of Internationalization**

In contrast to the incremental models of internationalization, the discontinuous models doubt that there is a smooth incremental process of increasing internationalization. Internationalization in these models is a discontinuous process which is marked by times of incremental evolution alternating with periods of radical change. The basic thoughts of this approach to organizational transformation can be traced to the „*Quantum View of Structural Change*“ (Miller/Friesen 1980, Miller 1982, Greiner 1972). In this view, organizations are characterized by an inherent trend towards stability (organizational inertia). The increasing need for adaptation to environmental changes which is neglected in times of stability leads to the necessity of „*quantum leaps*“ of structural change. During these periods of radical change there is a transformation not only of the „*surface structure*“ which represents a visible and objective level of organization (e.g. standard operating procedures, formal organizational roles). Also the „*deeper structure*“ of organizational beliefs, values, and orientations is subject to such radical change. In two different approaches, Macharzina/Engelhard (1991) and Kutschker (1994, 1996) adapt the discontinuous view of structural change to the process of internationalization.

Based upon the empirical research of 81 companies, Miller/Friesen formed the „*Gestalt*“ of ten organizational archetypes, using the dimensions environment, organization and strategic

decision-making as the fundament for their construction (Miller/Friesen 1978: 929). Macharzina/Engelhard add a fourth dimension to this framework for archetype-building to develop their concept of internationalization. This dimension is called „management“ and contains the values and beliefs of decision-makers. As it has been argued above, this dimension is of particular importance for the observation of internationalization processes. The approach of Macharzina/Engelhard (1991) is termed as the „Gestalt Approach of International Business Strategies“ (GAINS Paradigm). In their respective article, the authors choose the archetypes of „non-exporters“, „reactive exporters“ and „active exporters“ as examples for possible archetypes in the international context that have yet to be developed in a longitudinal research program (Macharzina/Engelhard 1991: 37).

Like Macharzina/Engelhard, Kutschker (1996) developed a „Dynamic Internationalization Theory“ without strictly following the tradition of incremental stage models. The incremental evolution is maintained and influences the „surface structure“ and the „deep structure“ in a recursive process.

The incremental evolution from time to time is interrupted by „episodes“. These are periods of intensive changes in the surface structure within the evolution of a company. Examples are market entries, cooperations and reconfigurations. The management of such an episode has to take into account the internationalization process in general and the continuity of the surface structure itself (Kutschker 1996: 18f). „Epochs“ represent a third facette of company evolution in form of longer periods of fundamental transition that cause a change of the technological core competences and the strategic orientation. Therefore, not only a change in the surface structure, but particularly of the deep structure of a company is induced. Epochs can contain several episodes (Kutschker 1996: 22f).

Kutschker (1994) also developed a three-dimensional model of internationalization based upon the geographic-cultural distance (markets), configuration of value-added activities (functions) and integration. Graphically these three dimension generate the „topography“ of the „internationalization mountain“ of a company. The topography visualizes the degree of internationalization along the three dimensions. The degree of internationalization changes according to changes in the topography. In this model an internationalization process (like a market entry or a new international cooperation) is represented by a change of the mountain’s topography. This might also be caused by an erosion of any of the three dimensions. This is an aspect that has been largely neglected by the traditional incremental (expansion) models. Kutschker/Bäurle (1997: 108) add „time“ as a fourth dimension to the model so that the evolution can be visualized as a process of continuous erosion and expansion of the topography over time.

### **3.4 Summary**

Internationalization Theories convey insights into the motives and drivers of internationalization. They are also very useful for a description and classification of different internationalization stages. Knowledge that helps management to find orientation for possibilities to influence and design elements of the evolution from a company point of view is very limited. Bäurle (1996: 176) notes, that the approaches to internationalization are missing any indications of managerial options to actively influence, regulate, and get some control over the internationalization of a company. Clues to a „planned internationalization“ or „self-organized globalization“ are missing. Particularly the management of the globalization *process* remains an open question because the dynamic force of globalization as described in chapter two is not taken into account. In the following the described internationalization theories shall be reflected on the basis of the proposed components of the management of a company’s globalization process as were discussed above:

- □ Development of international business activities

- □ Development of international networks
- □ Management of globalization dynamics

Classical theories of international trade as well as the described approaches in the tradition of Industrial Organization deliver explanations for the existence of international business activities. Management implications in terms of the three dimensions cannot be derived.

Vernon's cyclic model as well as the incremental stage models describe the internationalization process by defining certain stages of international engagement. The formation of 'fixed' stages brings about that the dynamic force itself which drives the evolutionary process gets lost between the fixed stages. Although time is integrated in these models, there is no grip on the evolutionary flow of structural change; leaving only a comparison of momentary stage conditions. Of the three dimensions, the build up of international activities is the core subject. Therefore a largely unidimensional and teleological view of internationalization is conveyed. Aspects of interconnected activities occur implicitly in Vernon's PLC in form of market and production interdependencies. The Scandinavian approaches furthermore pay attention to environmental influences by integrating the concepts of „psychic distance“ and „business distance“ although in a static manner. A dynamic component is integrated in the Scandinavian and Wisconsin approaches by depicting the core of internationalization as a learning process. Network-building activities have been conceptualized by Scandinavian scholars, whereas the co-evolution of company and environment as the driving force of globalization does not find explicit attention in these approaches.

The discontinuous stage models pay different attention to the three globalization dimensions. At the core of the GAINS-Paradigm stands the generation of different archetypes of internationally operating companies. Elements of the build-up of international activities and of networks can thus be found. Dynamic aspects of internationalization do not find consideration in this approach.

Taken as a whole, the internationalization topology by Kutschker and the accompanying dynamic model of internationalization offer the broadest potential for the processual observation and description of internationalization. The development of international business activities and network-building find consideration in this model. A dynamic view is guaranteed by the inclusion of time which enables a processual observation of „topological changes“ and evolutionary periods although an operationalization clearly will be difficult. The dynamic model also offers the possibility to describe transformation intensities.

All described theories nonetheless fail in the explicit observation of the dynamic co-evolution of a company and its respective environment. The potential for an adequate observation of globalization processes thus experiences a strong limitation because development can only be observed by dynamically operating sense according to a chosen difference. Therefore a background is needed for the observation of an object's movement. The interplay of environment and company evolution should be at the centre of the observation of globalization. In the next chapter the globalization of companies shall be examined from the perspective of social system theory, for which the difference system/environment is constitutive.

#### **4. Globalization of Companies from a Social System Perspective**

The globalization of a company can not be adequately observed without the inclusion of the task environment. Particularly the first steps into foreign markets a company takes generally turn out to be particularly painful because of missing knowledge and methods to cope with local conditions. This could be of minor importance if the entry into a stable context and situation could be prepared for. But what happens, for example, if my just recently started chemical

plant has to be shut down due to changed environmental legislation? A company's operations are embedded into the environmental process of permanent change so that it has to learn to deal with environmental dynamics. This process has been described in chapter two as a historical and evolutionary process of social differentiation and integration. This process can be attributed to the society (social world) as a whole or to certain elements, as companies, which found subsidiaries (differentiation) or initiate cooperations (integration) during their individual evolution. A company which is globalizing has to construct relations with new elements (subsidiaries, cooperation partners) to develop and exploit common advantages on a global basis. To know of which nature these advantages might be and how to exploit them best in an intra-/interorganizational configuration, companies have to get access to the underlying knowledge. This knowledge might yet be available anywhere in the company but might as well have to be acquired externally. During the whole globalization process, the company's viability and the continuation of its organizational transformation have to be secured.

This description of globalization conceals five constitutive cognitive differences of social systems (Luhmann 1984: 30 ff)

- □ system – environment                                      e.g. subsidiary – local market
- □ element – whole                                              e.g. subsidiary - company
- □ element – relation                                           e.g. organizational units - interdependencies
- □ identity – difference                                        e.g. MNC – multinational cooperation
- □ autopoiesis - allopoiesis                                e.g. management – national legislation

Cognitive differences are of particular importance for observers (e.g. decision-makers, researchers) because they describe the observable object and thus make it observable. The cognitive differences in Social System Theory, in contrast to most other theories, permit a holistic description of complex, dynamic systems. The focus is directed not only on the content of linear causality, e.g. the influence of environment on formal organization structure in contingency theory, but on the dynamic observation of social system evolution, particularly the co-evolution of a company in the global environment and of their respective sub-systems.

#### **4.1 The evolution of social systems**

The theoretical discussion of evolutionary dynamics can be traced back to the evolutionary principles of Darwin („evolution by sporting“), Spencer and Hegel („evolution by mechanical necessity“) and further to Fechner („evolution by mutual differentiation“) which were all developed during the nineteenth century (Heidelberger 1990: 174ff). All these approaches are based on the assumption of an historical process of differentiation and integration. This theoretical tradition later led to the concepts of homeostasis (Cannon 1926), „steady state“ (von Bertalanffy 1950) and to the pioneering works of Maturana et al. on „autopoiesis“ (Maturana 1980, 1981, Varela 1981). The concept of „autopoiesis“ was developed in the field of cognitive biology. By researching the evolution of cognition, Maturana et al. discovered this evolutionary principle that does not only apply to cognition but to all systems that meet the definition of being „autopoietic“.<sup>1</sup>

Cognition in terms of an autopoietic system is conceptualized as a self-organizing, self-referential and self-reproducing system. Because of its autonomy, each cognitive system has to construct and develop its own reality. Based upon its structure and operating modus, a

---

<sup>1</sup> Maturana (1981: 21f) defines autopoietic systems as „...systems that are defined as unities of networks of productions of components that (1) recursively, through their interactions, generate and realize the network that produces them; and (2) constitute, in the space in which they exist, the boundaries of this network as components that participate in the realization of the network. Such systems we have called autopoietic systems, and the organization that defines them as unities in the space of their components, the autopoietic organization.“

cognitive system has no access to any kind of „objective reality“. Its self-referential closure only permits the creation of a subjective reality by observing and thus interpreting the environment. „Structural coupling“ with other cognitive systems, by communicating sense and interacting according to it, leads to the construction of „consensual areas“ (structures of shared („objective“) meaning and expectations) which constitute the fundament of social systems. Interaction systems like organizations can be developed on the ground of such consensual areas (Figure 5). Structural couplings of systems lead to the development of isomorphic structures, which are the necessary precondition of communications und therefore of the construction of consensual cognitive areas (Wallner 1991: 78).

A common social reality is constructed by the institutionalization of rules, meanings, methods and other cognitive patterns. Social reality in terms of a product of social evolution serves as the basis for social action. The key to a successful co-evolution with the environment thus can be found in the construction, institutionalization and evolutionary adaptation of consensual areas. International differentiation of organizational units and activities of international operating companies, as well as the resulting interdependencies, lead to the particular demands on the management of globalization. Each organizational unit has to develop transparency in its self-definition and self-positioning in its internal and external context. This comprises several components in systemic positioning:

- □ definition of the core competence and core function of the unit, particular in relation to its internal and external context
- □ definition of the role the unit shall play in the company and the environmental context
- □ definitions of the boundaries with the internal and external environment and respective subsystems
- □ design of the corresponding structural couplings with interaction partners
- □ creation of customized and complementary consensual areas with interaction partners
- □ establishment of interaction patterns that are either limited or evolutionary conceptualized.

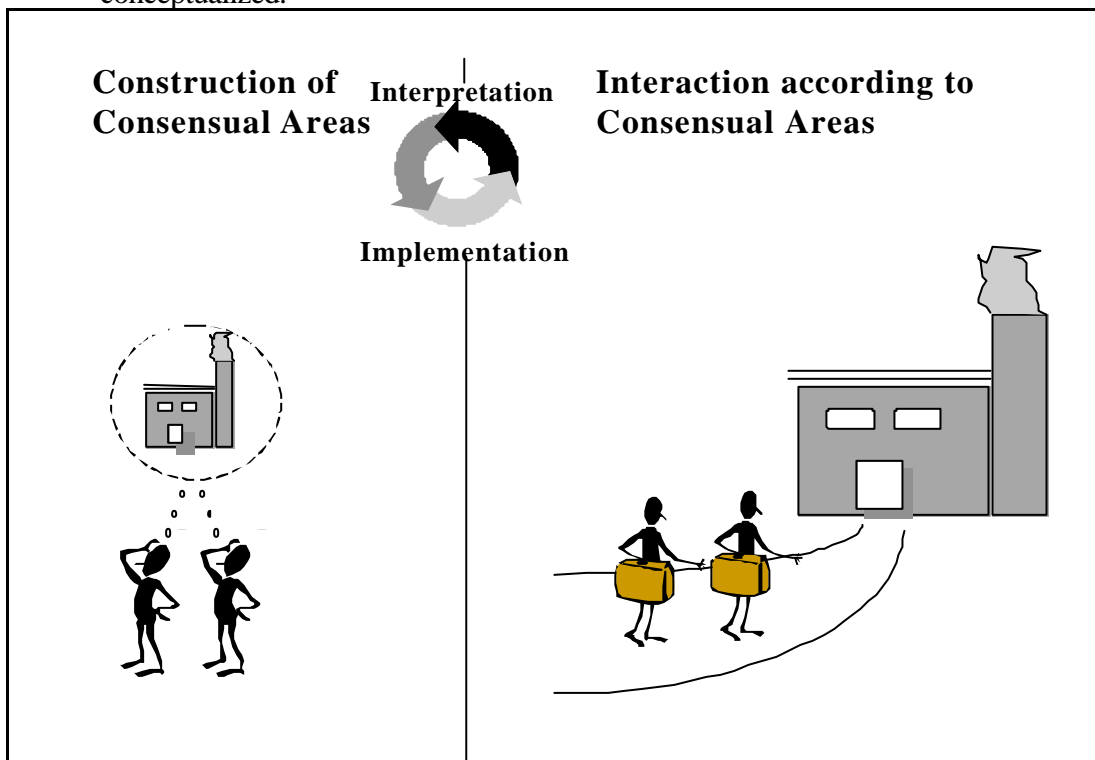


Figure 5: Construction of Consensual Areas

The construction of consensual areas can be viewed as the central demand resulting from globalization processes. New organizational units or cooperation partners have to be integrated into the ongoing structures and operations, so that the construction of a shared reality may be the fundament for successful interaction. New operations have to be negotiated and therefore to be constructed into the open space of options. Globally dispersed activities lead to an increasing necessity of consensual area construction and integration. Local subsidiaries have to develop their consensual areas and structural couplings in their local context and that way be the source of innovative processes for the whole network. The cooperation with local partners can as well lead to the construction of innovative products, practices, etc..

On the other hand, standardized knowledge in form of „best practices“, standardized processes and products or structural arrangements have to be conveyed to new units and partners to guarantee efficiency and continuation as well as boundary-spanning fit to existing structures and processes. The development of transparency in the own structures and operations is therefore a very important step to develop the ability to communicate and construct new realities with partners, cooperation partners as well as other internal organizational units.

*Particularly the variety of consensual areas on the global scale can be viewed as the central challenge to the management of globalization. It can be the source of conflicts and misunderstanding as well as a fountain of new ideas and innovations and thus exerts a fundamental impact on the evolution of a company.*

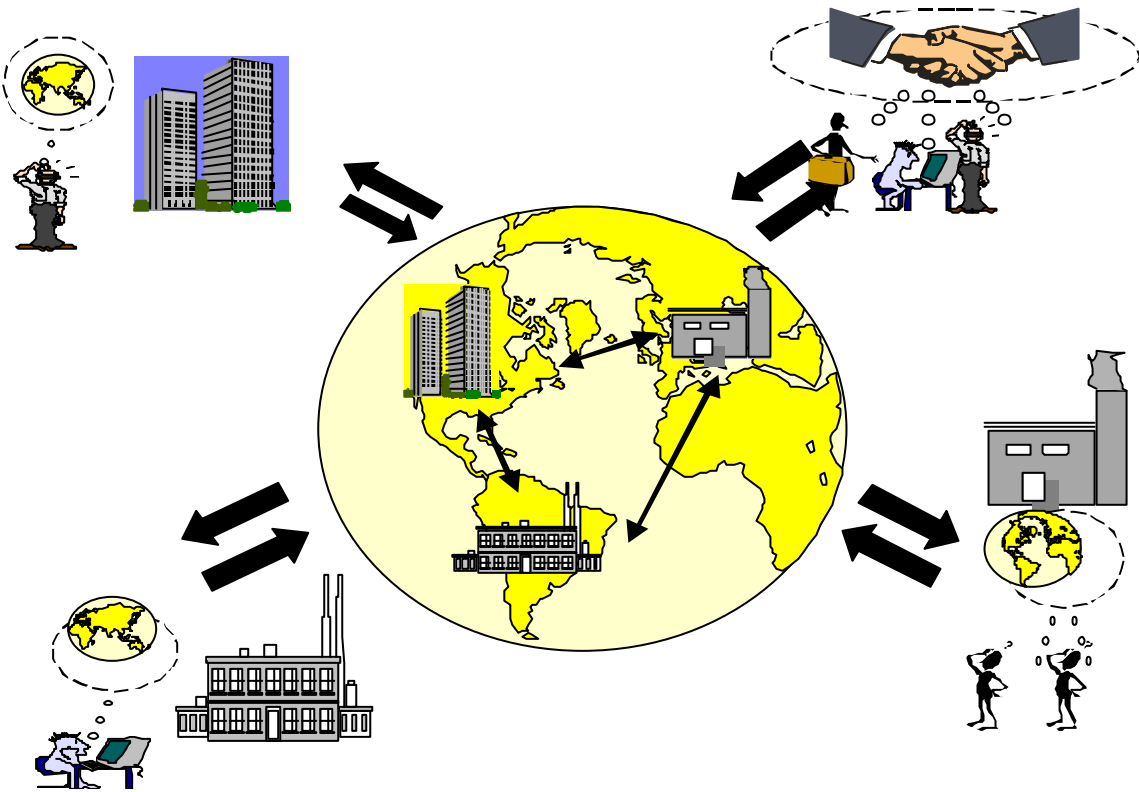


Figure 6: Integration of Global and Local Consensual Areas



## 4.2 Management of Differences in International Management

A discussion about a theoretical framework in International Management that could be based upon the concepts of complexity and difference was initiated by Wiesmann (1993). He views the boundary-spanning character of activities as the central demand for International Management. Boundaries in this respect are interpreted as „specific differences“ that can be grouped into (Wiesmann 1993: 109f):

- ▶ □ Geographical differences
- ▶ □ Cultural differences
- ▶ □ Systemic differences (political, legal, infrastructural, etc.)

Cultur-based differences of perceptions are exceptionally increasing the complexity, according to Wiesmann (1993 and Dülfer (1991). A further increase of complexity is caused by differentiated roles of internationally dispersed organizational units. (Wiesmann 1993: 115f).

Evans/Doz (1992) propose an appropriate balance of „dualities“ in International Management as the fundament of an equilibrated evolution of enterprises. The balance between complementary dualities should be regarded as dynamic; asymmetry should never oppress the other pole totally because this would lead to organizational degeneration und crises. The maintenance of a duality, e.g. in case of the temporary concentration on one pole, can be sustained by „*cultural layering*“ . Dualities can thus be integrated into management processes and culture, so that a rich structure of differentiated perceptions, cognitive orientations, relations, and networks is created, that especially serves to enrich the decision-process (Evans/Doz 1992: 90-97).

Cameron (1986: 545f) assumes an even deeper necessity in the development of a „*Janusian Thinking*“, together with the cultivation of flexibility and of the adaptability by manifesting paradoxes, like the simultaneous presence of loose coupling (sustains innovation, flexibility) and tight coupling (sustains implementation competence). Empirical research by Eisenhardt/Bourgeois showed, that in a turbulent environment, the decision-process of successful companies were characterized by the balancing of different dualities at the same time (Eisenhardt 1989: 555-558).

Gioia/Chittipeddi (1991) suppose that strategic change always comprises the attempt to change existing organizational cognition- and action-patterns in order to enforce the effectiveness of actions in case of changing conditions. By destabilizing organizational members in their perceptions of their own organization and its context, strategic change is supposed to be easier conducted. To pursue this object, a time of destabilization of existing cognitive patterns and an atmosphere of departure can be very helpful to initiate a reorientation or progress. The leading forces of change have the possibility of sense-making and sense-diffusion. This way a profound reorientation in the cognitive predispositions of the organization's members can be reached, not in the sense of revolutionary change, but regarding the intensity of the effects of changes in organizational dispositions (Gioia/Chittipeddi 1991: 434ff). Thomas /Gioia/Fetchen, Jr. (1997: 301ff) refine this concept to „*strategic sense making*“, which is regarded as a basis for organizational learning. It is recursively generated by a cycle of „Scanning-Interpretation-Action-Performance-Scanning-etc.“ This cycle of organizational learning influences the cognitive structures, which themselves influence the sense-making process so that a dynamic cycle of organizational learning and the evolution of cognitiv structures is generated. Empirical evidence of this cycle has been found by Bettman/Weitz (1983) and Fahey/Narayanan (1989).

### 4.3 A System-Based View of Globalization

As already discussed in chapter one, a system-based approach to internationalization should particularly make use of its theoretical resources to describe internationalization in terms of an evolutionary process of growing international complexity in the activity and organization structure. At the same time, the evolution of an individual company is embedded in the evolution of its respective environment, especially the competition, which itself is on the pace of global evolution. Companies and their environments find themselves in an co-evolutive interplay that is marked by processes of differentiation and integration which are reinforced by the decreasing rigidity of boundaries. This process leads to an expanding and intensifying „*network-competition*“. As already described in chapter three, companies have to cope with their structural couplings on the level of all their organizational units. The global differentiation of activities leads to a multiplication of different contextual demands, that a company has to find organizational answers for (Colberg 1989: 34).

In order to exemplify the above described three key dimensions of the a firm's globalization process, the evolutionary dynamics are reduced to a three stage model (Figure 7), as was done to describe the evolution of global competition as well. The first stage represents the start as a national company that in a first step builds up individual business activities in the international context (stage 2 ) which are increasingly embedded in global network relations (stage 3). The observation of this process from a systemic perspective can be ensured by the conceptualization of organizations and organizational units as social systems with structural and functional (processual) properties which are evolving in an interplay with their internal and external environments. In order to observe the co-evolution of different systems and their environment, a conceptualization of system properties has to be developed. Each social system must be described by the same basic properties to guarantee a consistent observation of their respective evolution. This is also necessary to describe evolutionary changes and innovations, their institutionalization and their diffusion via structural coupling (isomorphism). Globalization can thus be described as the co-evolutionary process of differentiation and integration of social systems, their environment and their (social) subsystems. For reasons of comparability of systems that in reality are very different, the broadest common ground has to be developed for a characterization of social systems.

In order to describe the evolution of firms, these are conceptualized as social systems. Firms, other organizations, as well as the respective organizational subunits (subsidiaries, departments, job position) are conceptualized as „organizational units“ with the same general properties fundamental to an evolutionary perspective. These properties are:

*Primary Transformation Processes (PTP):* Each organizational unit is primarily characterized by a functional task it has to fulfill. This might be the production of computers in case of a whole company, the development of strategic alternatives in case of a planning staff or the writing of bills in case of an individual job position in a sales department. As already known from process organization, processes are marked by process sources and process clients. Therefore, PTPs constitute the basis for interdependencies between organizational units. (internal and external).

*Regulating Processes (RP):* Each organizational unit has to conduct regulating processes in order to organize, plan and control its own originate processes or the ones of other units. This seems clear on higher organizational levels, but even on the level of individual job positions this happens in form of self-regulation, e.g. in individual work organization. Regulating processes constitute, what Bartlett (1986) calls the „*physiology*“ in his description of „*Transnational Management*“.

*Organization Structure:* Organization structure can be differentiated into a formal, explicit, therefore „objective“ structure of roles and expectations, and an informal, implicit, „subjective“ structure which comprises consensual areas with very different grades of consistency.

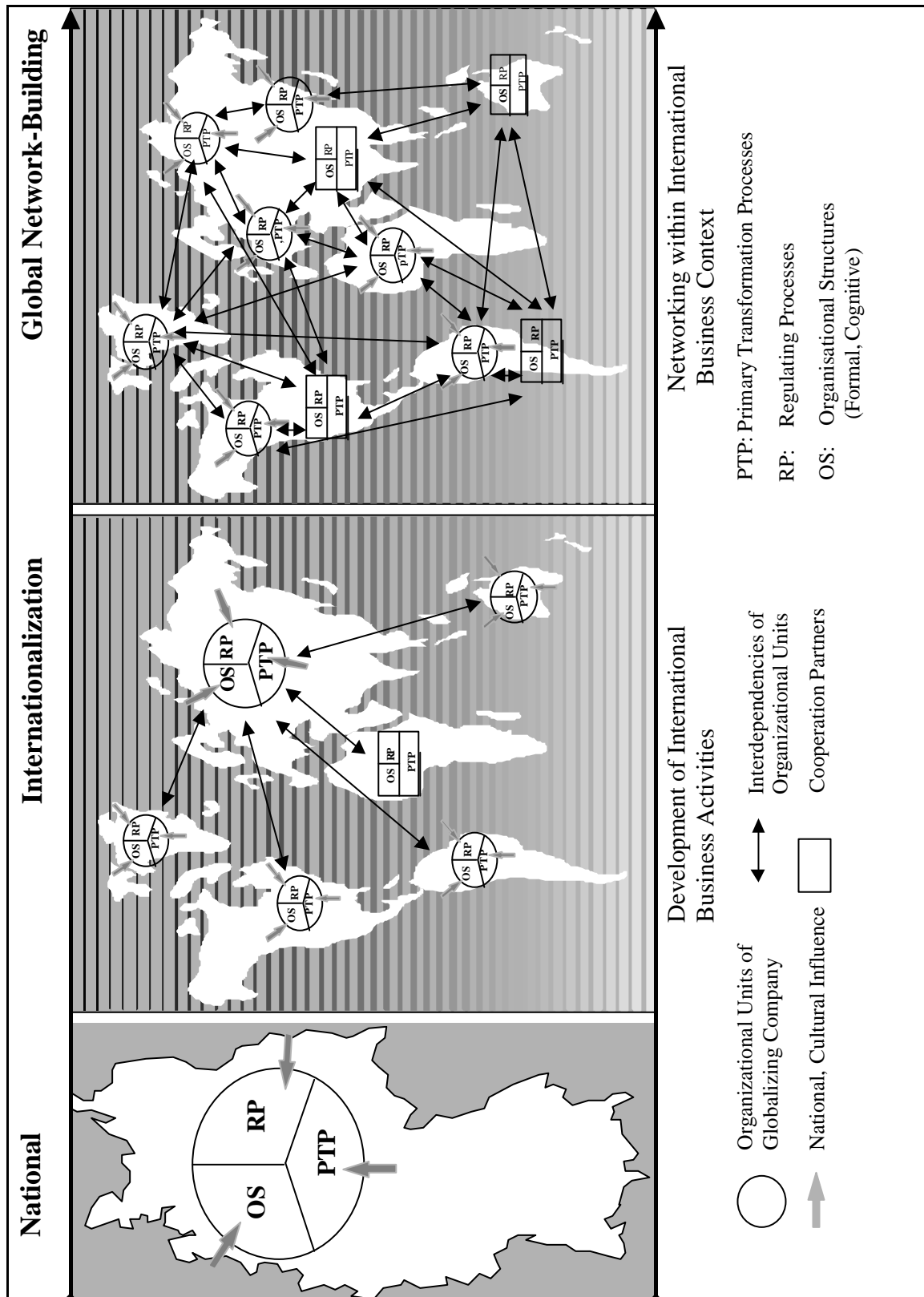


Figure 7: Globalization of a Company

Despite the often cited economic and political constraints of the „competitive reality“ which are reproduced in a self-fulfilling manner in economic and management discourse, there is a huge potential in mobilizing the consensus-building properties and thereby the „hidden

*resources*“ of a company. Particularly companies that are working on a global scale should explore the abundance and variety of resources yet to be developed by a consensual approach

## Conclusion

The Globalization of a Company is embedded in the globalization of its task environment. This process can be described as a co-evolutionary process of a social system in its environment. A historical view of the globalization of competition seems to prove that it can be interpreted as an evolutionary process of differentiation and integration, that is reinforced by the decreasing rigidity of boundaries. A „liquefaction of competition“ can be observed, in which an increasing number of autonomous economic actors (decentralized MNC-units, SMEs) are competing and cooperating in the global context. As a result, a „network competition“ is emerging, which can be traced to an increasing expansion and density of economic and other social interactions. The competence of networking on a global scale thus becomes a central demand in the process of globalization. The feedback-loop of globalization is accompanied by an increasing dynamic, so that the competence to cope the evolutionary dynamics of globalization becomes the second central demand for management. A management of globalization thus should be based on the classical competence of internationalization in the sense of a build-up of international business activities. This has to be complemented by the competences of global networking and evolutionary dynamics.

Internationalization Theories are valuable to provide reasons for the existence of international business activities and to convey a picture of internationalization processes in form of incremental and discontinuous stage models. The time dimension is thereby used to describe internationalization paths. The company-environment interplay, network-building and particularly the globalization dynamics themselves do not find the sufficient attention in this theoretical field to explain globalization processes. Therefore, an evolutionary view from the perspective of the Social Systems Theory has been adopted to get a grip on the dynamics of the co-evolution of social systems and their environment. Thus, the inter- and intraorganizational evolution of structures (formal, cognitive) and processes (primary transformation, regulation) can be conceptualized. As the central demand of globalization from this perspective can be viewed the task to construct consensual areas between globally dispersed organizational units. The adaptation of explicit knowledge (‘best practices’, standardized business processes) to different national and cultural contexts and the creation of new realities by constructing and developing new consensual areas is at the centre of this central task. In the process globalization, each organizational unit has to reflect itself on the basis of the constitutive systemic differences (e.g. system/environment) in order to develop the needed transparency for self-organization and cooperation in the evolutionary process.

## References

- Bamberger, I. & M. Evers** 1996. Internationalisierungsverhalten von Klein- und Mittelunternehmen. In: J. Engelhard, H. Rehkugler, editors. Strategien für nationale und internationale Märkte. Wiesbaden: Gabler
- Bettman, J.R. & B. Weitz** 1983. Attributions in the Board Room: Causal Reasoning in Corporate Annual Reports. *Administrative Science Quarterly*, 28: 165-183
- Bilkey, W.J. & G. Tesar** 1977. The Export Behavior of Smaller Wisconsin Manufacturing Firms. *Journal of International Business Studies*, 9: 93-98
- Böttcher, R.** 1996. *Global Network Management*. Wiesbaden: Gabler
- Cameron, K.** 1986. Effectiveness as Paradox. *Management Science*, 5: 539--552
- Cavusgil, S.T.** 1980. On the Internationalization of Firms. *European Research*, 11: 273-281
- Colberg, W.** 1989. *Internationale Präsenzstrategien von Industrieunternehmen*. Kiel: Wissenschaftsverlag Vauk

- Eisenhardt, K.M.** 1989. Making Fast Strategic Decisions in High Velocity Environments. *Academy of Management Journal*, 3: 543-578
- Evans, P.H.L. & Y. Doz** 1992. Dualities. In: V. Pucik, N.M. Tichy, C.K. Barnett, editors. *Globalizing Management*. New York: John Wiley & Sons
- Fahey, L. & V.K. Narayanan** 1989. Linked Changes in Revealed Causal Maps and Environmental Change: An Empirical Study. *Journal of Management Studies*, 26: 361-378
- Gioia, D.A. & K. Chittipeddi** 1991. Sensemaking and Sensegiving in Strategic Change initiation. *Strategic Management Journal*, 12: 443-448
- Heidelberger, M** 1990. Concepts of Self-Organization in the 19<sup>th</sup> century. In: W. Krohn, G. Küppers, H. Nowotny, editors. *Self-Organization*. Dordrecht: Kluwer Academic Publishers
- Johanson, J. & J.-E. Vahlne** 1977. „The Internationalization Process of the Firm“. *Journal of International Business Studies*, 2: 23-32
- Johanson, J. & F. Wiedersheim-Paul** 1975. The Internationalization of the Firm – Four Swedish Cases. *Journal of Management Studies*, 3: 305-322
- Kutschker, M** 1994. Dynamische Internationalisierungsstrategie. In: J. Engelhard, H. Rehkugler, editors. *Strategien für nationale und internationale Märkte*. Wiesbaden: Gabler
- Kutschker, M.** 1996. Evolution, Episoden und Epochen: Die Führung von Internationalisierungsprozessen. In: J. Engelhard, editor. *Strategische Führung internationaler Unternehmen*. Wiesbaden: Gabler
- Luhmann, N.** 1984. *Soziale Systeme*. Frankfurt: Suhrkamp
- Luostarinen, R.** 1980. *Internationalization of the Firm*. Helsinki: Acta Academiae Oeconomicae Helsingiensis
- Macharzina, K. & J. Engelhard** 1991. Paradigm Shift in International Business Research: From Partist to Eclectic Approaches to the GAINS Paradigm. *Management International Review, Special Issue*, 31: 23-43
- Martinez, J.I. & J.C. Jarillo** 1989. The Evolution of Research on Coordination Mechanisms in Multinational Corporations. *Journal of International Business Studies*, 3: 489-514
- Maturana, H.R.** 1980. Man and Society. In: F. Benseler et al., editors. *Autopoiesis, Communication, and Society*. Frankfurt: Suhrkamp
- Maturana, H.R.** 1981. Autopoiesis. In: M. Zeleny, editor. *Autopoiesis*. New York: North Holland
- Miller, D. & P. Friesen** 1980. Archetypes of Organizational Transition. *Administrative Science Quarterly*, 6: 268-291
- Moore, K. & D. Lewis** 1998. The First Multinationals: Assyria Circa 2000 B.C.. *Management International Review*, 38: 95-107
- Thomas, J.B. & D. Gioia & D.J. Ketchen, Jr.:** Strategic Sense-Making. *Advances in Strategic Management*, 14: 299-329
- Wallner, F.** 1991. Selbstorganisation-Zirkularität als Erklärungsprinzip?. In: H.R. Fischer, editor. *Autopoiesis*. Heidelberg: Carl-Auer-Systeme Verlag
- Wiesmann, D.** 1993. *Komplexität und Differenz*. Konstanz: Universitätsverlag