LogDynamics
International Graduate School

Effectiveness and Sustainability through Global Logistics Systems

Knowledge Matches Knowledge

Motivation

Sourcing and selling abroad have given rise to several challenges, such as: How to deal with and profit from emerging opportunities and threats in culturally, geographically, administratively and economically distant nations? Real issues are generated due to existing variety of contexts, organisations and individuals (Figure 1). Across these distances and boundaries, connective logistics systems are strategic for organisations' performance.

Research Question

How to cope with and profit from distant contexts' variety in order to enhance the effectiveness and sustainability of business plans?

Aims

The doctoral research aims to (i) deepen the understanding about cultural diversity and its influence in the design, planning and implementation of logistics systems and (ii) enhance knowledge and information transfer between partners in cross-cultural contexts. The paramount goal is to contribute to the comprehension and improvement of logistics systems within current and forthcoming challenging business environments.

Methods

The methods applied comprise initial exploratory research followed by the development of a descriptive model, an evaluation framework and a strategic road map. Finally, a business application prototype will be implemented.

Going Global

A relevant side of globalisation has been the pursuit of new and attractive markets as well as high quality low cost sources. Logistics systems (Figure 2) can be understood as connective – e.g. sources to markets – networks driven by organisations' strategy, structures, policies and decision making. These systems are increasingly relevant because prduct imitation is becoming far easier than the replication of the process used to make and market it. Therefore, especially in highly competitive industries, logistics system uniqueness could represent a powerful differentiating advantage.

Matching Knowledge with Knowledge

Innovation can be viewed as a path- and context-dependent process (history and place matter). It arises out of systemic interaction between actors and stakeholders involved in the production, diffusion and use of new and economically useful knowledge. It is distinctly challenging in the current interwoven world which is impregnated with external information and characterised by fast evolving opportunities and threats. Today's abundance of information does not naturally lead to strategic and valuable knowledge. On the contrary, enhancing competitive advantage on the basis of overlap and diversity of knowledge must be actively pursued.

External information identification and acquisition require the recipient to possess suitable the background and skills to assimilate new knowledge. Both overlap (to enable internal communication) and diversity (to potentialize the comprehension of outside information) of knowledge structures are essential. Therefore, individuals with suitable background (i.e. education, experience and culture) play a central role in enhancing the fitness function of business plans. Innovation can be also interpreted as the iterative matching of technical possibilities to opportunities via market and non-market interactions, feedbacks and learning processes throughout research and development, experimentation (trial and error), production and logistics networks. Profiting from matching process requires that organisations' boundaries are conductive to valuable knowledge.

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Fitting Business Plans to Contexts

To cope with increasingly complex structures and dynamic behavior, organisations' strategy, structures and policies should properly support decision making. In fact, according to evolutionary economics, social and physical technologies coordinated under evolving business plans play a central role in today's innovative economy. The process of differentiation, selection and amplification takes place through the interplay of organisations' business plans and market as well as non-market feedbacks. A plans' effectiveness and sustainability will depend fundamentally on knowledge at sight and in practice throughout the decision making process.

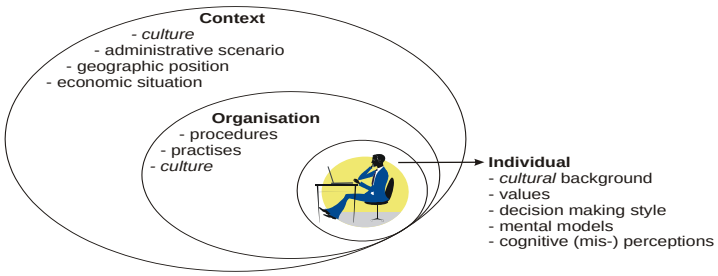

Figure 1: Context – Organisation – Individual

Integrating, Communicating and Leveraging Knowledge

Connective and cross-border logistics systems are strategically relevant for enhancing the effectiveness and sustainability of organisation's business plans due to their capacity for integrating, communicating and leveraging knowledge in distant contexts (Figure 3). The resulting innovativeness might enhance organisations' differentiation, hence supporting potential competitive advantage along time.

Taking the above insights and considering the doctoral character of this research it would be illuminating to develop a business application prototype.

Potential clients are organisations interested in better dealing with and profiting from the threats and opportunities emerging in distant contexts.

The main business outcomes would be:

- knowledge integration model, approaching organisations' logistics systems and evolving business plans
- indicator framework, assessing potential impacts on effectiveness and sustainability
- strategic and long-term learning process, including feasible actions (i.e. road map) toward increasing competitive advantage.

Cultural	Administrative
Different languages	Absence of colonial ties
Different religions	Absence of common currency
Different values, norms and dispositions	Political hostility
Lack of Trust	Institutional weakness; corruption
Geographic	**Economic**
Physical distance	Consumer incomes differences
Lack of a land border	Differences (cost and quality):
Differences in climates	Natural resources
Weak transportation/communication links	Human resources
	Infrastructure
	Information or knowledge

Figure 3: CAGE Distance Framework (excerpt)

The trade-off concerning the scientific contribution and sound benefits to business partners as well as data confidentiality will be carefully handled. The application would follow a 3-phase structure:

- partners, collaboration frameworks and locus identification
- descriptive integration model, indicators framework and road map customisation
- report and presentation.

The following potential partners could be cited: (i) manufacturing firms with current or planned international ventures (e.g. sourcing and/or marketing), (ii) logistic services firms with international operations (e.g. partnerships, direct investments).

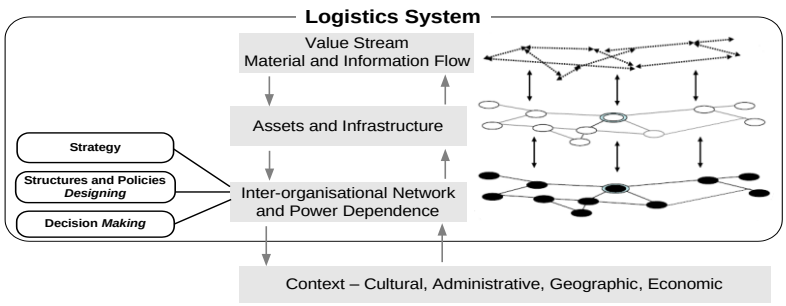

Figure 2: Logistic Systems

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