The influence of national culture on third party logistics outsourcing: An Asia-Pacific focus

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Description
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ABSTRACT
This work aims to contribute to the theory with regards to the effects of national cultural influence on the decision-making and implementation process of logistics outsourcing within multi-national corporations in the Asia-Pacific region. By attempting to investigate one of the areas where relationships fail, this paper aims to identify where organisations utilising 3PL services can gain insight into the effect of culture on success in company relationships, and be able to use this to gain a competitive advantage through outsourcing relationships.

1. INTRODUCTION
Multinational corporations (MNCs) seek to maximise profits and minimise risk (Garnier 1983). Where MNCs operate in foreign environments, risk is increased due to issues of economics (Andersen 2011), control (Garnier 1983) and coordination (Tong 2007). MNCs seeking maximised profits are often forced to utilise international suppliers in order to remain competitive from either a cost (Carter 2010) or technology (Chung 2008) perspective, thus sharpening the focus on the international supply chain to further success. Supply chain management encompasses the planning, coordination and management of all product and information flows, upstream and downstream, including relationships with suppliers, intermediaries, third party service providers, and customers. Supply chain management integrates partners up and down the channel to deliver superior value at a lower cost to the entire channel (CSCMP 2012, Christopher 2010).

Business decision-making to benefit the entire supply chain is difficult. There are conflicting motivations, competing objectives and organisational integration required to achieve successful decisions (Gimenez 2012). Decision-making in supply chain management is further strained due to the fact that a number of supply chains are increasingly likely to cross international boundaries. Salleh (2009) observes from World Trade Organisation (WTO) data that international trade from Asia increased dramatically from 1993-2003 (refer Table 1), with significant growth in international trade experienced between 1993 and 2010.

<table>
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Table 1: Source: WTO International Trade Statistics (2005) in (Salleh 2009) and WTO International Trade Statistics (2011)

Inter- and intra-company management of supply chains across international borders requires strong relationships that bridge these borders, and is paramount to business success (Katsikeas 2009). Relationships between organisations are built on relationships between people, necessitating the consideration of labour and therefore
culture with regards to international supply lines (Blocker, & Flint 2007). Compounding this, the trend for organisations to outsource their logistics and supply chain management services to third parties - a practice known as third party logistics (3PL) outsourcing (Langley 2010) - becomes an area where the impact of culture on decision-making is brought into focus.

This paper goes on to identify and examine relevant literature in the area of decision-making in multinational corporations, logistics and its position within the supply chain, followed by the role of logistics outsourcing and national cultural distance measures. A theoretical framework is then suggested that underpins future case study research.

1.1 The Global View
Business in Asia is considerably international, with Shanghai and Singapore ranking as the top two busiest container ports in the world (American Association of Port Authorities 2011). Table 1 illustrates a clear growth in international trade, however less apparent is the fact that Singapore’s international trade figures are significantly larger that the nation’s GDP. Singapore is a large transshipment hub for the region, which results in a high number of re-exported products (WTO 2011). Transshipment is where cargo is moved from one transportation vessel (such as a container ship) to another (such as another container ship, or plane) (Vis 2003). In Singapore, transshipment usually translates into import and immediate export as a significant portion of goods that enter its ports are not destined for the local market - approximately 51% of total imports according to the Department of Statistics (Yearbook of Statistics Singapore 2012). This is an indication of Singapore’s significant role in regional trade, and in addition to the stability and robustness of its legal system, why it is host to a large number of businesses and their multinational headquarters.

The resulting international relationships that exist between the regional headquarters and branch locations of subsidiaries, suppliers, customers and other supply chain partners requires collaboration in order to ensure the benefits of a closer working relationship (Sodhi & Son 2009). Collaboration between organisations (as opposed to short-term transactions) is seen as a value-adding activity that benefits all parties in the supply chain (Tsai et al 2012) and these relationships are such that they can significantly impact an organisation’s financial performance (Sodhi & Son 2009). The need for strong relationships over international borders prompts the evaluation of culture with regards to international supply lines (Blocker & Flint 2007), and its necessary acknowledgement when doing any sort of business in an international arena. Thus the trend to outsource logistics and supply chain management services to third parties (Langley 2010, Langley 2012), combined with cultural differences between countries adds risk to outsourcing relationships, and therefore border spanning supply chains (Jia 2010, Metters 2010).

1.2 Logistics
1.2.1 From Supply Chains to Logistics
Supply chains are inherently complex (Defee et al 2010). They have a myriad of suppliers, customers, suppliers’ suppliers and customers’ customers that integrate complex functions from the original raw materials suppliers to production and eventual distribution of a good for consumption (Maku et al 2005). Supply chains are also seen as “competitive weapons” with multiple points of differentiation being process-based and personnel-based sources of strength (Hult et al 2006, p. 459). Supply chains are made up of a number of logistics “flows”, each combining the raw materials or component parts from other flows. Organisations are nodes in these flows, with product, information and monetary movement being the links between these nodes (Christopher 2010). The
build up through the combination of links and nodes from raw material suppliers (such as cattle or wheat), through various stages of processing to customers in various locations globally (as leather handbags or breakfast cereal) can be overwhelmingly complex to address from a practical perspective in a research environment.

This research aims to address a portion of this complexity in the form of snapshots of logistics flows that make up larger supply chains across a limited number of companies. So rather than addressing entire supply chains, logistics flows (or pipelines) within supply chains will be investigated.

The logistics management definition has been simplified to the Seven R’s of Logistics: that the right product is available at the right time, in the right place, in the right quality and quantity for the right customer at the right cost (Rutner & Langley 2000). The CSCMP (2012) definition, however, highlights the level of integration that is required for this to occur. Simplified: sometimes the logistics function is organisational glue.

Relationships within logistics (Aquilon et al 1997) considers the internal and external relationships between stakeholders and levels within the logistics function. It is not simply the relationship that logistics has with other departments that makes the delivery of products in the supply chain possible. It is the coordinating between the myriad of logistics and other business functions. When these functions are pushed outside the organisational boundaries, as is the case with logistics outsourcing, this becomes more complex, and a higher level of relationship management is required (Christopher 2010).

1.2.2 Outsourcing

Definitions of outsourcing vary from stating that it is where an activity or series of activities normally conducted within the organisation is carried out by an external vendor (Baithiemy 2003), or that it is simply the subcontracting of production of component parts to third party manufacturers (Grossman 2005). Martin Christopher (2010) differentiates between these in saying that subcontracting, such as that of component parts manufacturing, is “where a task or an activity is simply handed over to a specialist” (p. 144). He then goes on to say that outsourcing is where organisations agree on common goals and utilising their strengths (core competencies), work jointly to bring value to customers. This is the approach to outsourcing that will be used for the purpose of this research.

Organisations face pressure to increase competitiveness through cost reduction, higher returns on assets and investments, and the increase of flexibility that can be achieved through using outsourced providers (Young 2007). The outsourced providers’ ability to provide this through economies of scale and expertise pooled from exposure to a larger number of customers and environments, allows MNCs to focus on core competencies (Young 2007), and utilise the core competencies of partner organisations. Both the outsourcer provider and the company who is outsourcing seek to do more with less (Inisinga 2000). In outsourcing activities to increase competitiveness, organisations seek to form long-term relationships (or partnerships) between the company and the outsourcer provider (Lambert 1999). Outsourcing is common with regards to logistics activities (Langley 2010, Langley 2012), and as such will be discussed in detail in the next section.

1.2.3 Third Party Logistics Outsourcing

The logistics outsourcing of key transportation and warehousing activities is usually contracted to organisations known as Third Party Logistics providers, or 3PLs (or TPLs in some articles). There are mixed definitions of the services provided by 3PL providers. There is the simplified perspective of these services being limited to warehousing and
transportation services, supported by the trend that warehousing and transportation services are among the most common services contracted to 3PLs (Salleh 2009, Langley 2012). In some cases, the 3PL services are more complex, ranging from the more tactical level activities such as packing and assembly, customer service and order fulfilment, to the more strategic planning and execution of logistics and supply chain activities (Marasco 2008, Langley 2012).

A large proportion of the functions that support product movement within the supply chain are service-based. As a result they are heavily reliant on the combined characteristics and capabilities of individual employees, and this can make a key difference in the relationship with 3PL chosen for the contract, and the way that the contract is then delivered into the organisation’s supply chain. In instances of cross-border logistics flows within supply chains, national culture adds to this complexity of employee and organisational network structure. National culture will be examined in section 2.4 with regards to the distance between cultures and how this is an area requiring further exploration in the management of logistics outsourcing.

1.3 Multinational Decision-making

1.3.1 Multinational Corporations (MNCs)

Multinational organisations are organisations that operate across international borders - by definition being organisations that operation in two or more countries - and do so to seek the increase of value to shareholders, and address concerns and issues of other stakeholders (Grosse 2004). The environment they operate in is rife with complexity and uncertainty (Grosse 2004). Markets are complex, the interactions of organisations within those markets are complex, and the addition of people (labour) and their differences across national boundaries to that mix only seeks to stir the pot of an already complicated stew.

MNCs strive for maximised profits and reduced risk, however operating cross-culture is an area of MNC risk (Tong 2007). Multinationals that have a significant number of international subsidiaries stand to lose the competitive advantage they gained by initially expanding overseas, and look to global strategy, supply chain integration and organisational structure to improve flexibility and facilitate enterprise-wide effectiveness, resulting in some decentralised decision-making (Gimenez 2012, Tong 2007). In order to achieve this flexibility, MNCs often structure their decision-making in a hierarchical fashion (Papanastassiou et al 2009). This involves the layering of the organisation, usually in a top-down structure, with decisions at different levels being made dependent on the scope and applicability of the decision to be made.

1.3.2 Multinational Decision-making

Logistics outsourcing 3PL decisions are made at varying levels within an organisation. There may be decisions to implement global 3PL partners for logistics services required across the organization (Steptoe-Warren et al 2011), in addition to any regional or local partners required for specific requirements that may not be addressed by the global provider.

Bowman, et al (2000) state that the decision-making is generally imposed by parent companies in multinational corporations (MNCs), leaving operational decisions to be made and implemented by the subsidiaries. Research by Insinga and Werle (2000) also supports this, stating that in outsourcing decision-making, it is better for overall organisational performance if the objectives of outsourcing are linked to the overall business strategy.
In considering supplier selection as part of outsourcing decision-making process, Carter, et al (2010) noted that given the shift to outsourcing to Asia there was little note in the literature concerning the cultural perception differences and the bias of evaluation caused by differences in the supplier selection process. In applying this to MNC decision-making, the supplier selection decision process that occurs at global or regional headquarters level will carry with it the cultural bias of the individual decision makers at that level. Carter suggests that culture be considered as part of the selection process. Significantly, this will affect the decisions made at global or regional levels and their implementation at the branch. The difference in societal values between the global or regional headquarters and the branch location could, for example, explain why some decisions, communication and implementation of those decisions may be more successful in some countries than others.

1.4 The Significance of Culture and Cultural Distance
Culture itself is an area that has attracted a great deal of attention since it was first defined in anthropological terms by Tylor (1903, p. 1):

“Culture or Civilisation, taken in its wide ethnographic sense, is that complex whole which includes knowledge, belief, art, morals, law, custom, and any other capabilities and habits acquired by man as a member of society.”

National cultural distance measures are used to measure the extent to which shared values and norms differ from one country to another (Drogendijk & Slangen 2006) - as a tool of comparison of one culture to another with regards to certain characteristics or dimensions. Kogut & Singh (1988) applied this to identify how the social norms differ between the parent company home-country culture and the host-country culture of the subsidiary.

Geert Hofstede’s work (1980) on cultural distance measures is possibly the most influential and cited (Metters 2010, Minkov 2011). This resulted in the development of four cultural dimensions classified over 40 countries, namely Power Distance (PDI), Individualism/Collectivism (IDV), Masculine/Feminine (MAS), and Uncertainty Avoidance (UAI). These were then later expanded. Long-Term Orientation (LTO) was introduced in 1988 with the research of Michael Bond incorporating the Chinese Value Survey (Hofstede and Bond 1988). This addressed one of the criticisms of the original values surveys in that they were the product of minds from western societies. The Chinese Values Survey was a product of Chinese colleagues of Michael Bond (Minkov 2011).

In 2004, House, et al published the results of the Project GLOBE (Global Leadership and Organizational Behavior Effectiveness) research, which was partly based on Hofstede’s work and accepted the paradigm that dimensions of national cultural could be constructed that correlated across nations (Berry, et al 2010). Project GLOBE resulted in nine values, some of which coincide with Hofstede’s measures.

There has been some disagreement over the number and type of national cultural distance measures that should be used, due to classification of characteristics within the standardised questionnaires. For example, Schwartz disagreed on the Hofstede classification of values in the Individualism-Collectivism measure and proposed a scale be used rather than polar opposites (Schwartz 1990). There is general agreement, however, that these measures should be used to compare groups from countries, rather than attribute them to specific behaviours in individuals.
1.4.1 Criticisms on the use of Cultural Distance Measures
There have been a number observations made concerning various models of cultural distance with respect to the typically dichotomous nature of a number of these models. Unidimensional models have their place in research as they are based on correlations and allow two variables to be compared (Hofstede et al 2010). Bearden et al (2006) argue that the unidimensionality of these national cultural distance measures is a simplification of the complex nature of culture. The GLOBE study bears the same criticism as Hofstede’s measures - unidimensionality (Berry et al 2010). They argue that this is particularly so at the individual level. Hofstede et al (2010) acknowledges this complexity through the admission that some of the correlations in the original IBM study were weak, however they state that these correlations were still interesting as they reflect the impact of other factors working simultaneously in the social world. This is further reflected in the research by Singh (2007), which argues that the consideration of the impact of culture on strategy should acknowledge that culture is one element that should be considered as part of the context of internationalisation.

1.4.2 Culture in Past Supply Chain Management Research
Supply Chain Management is an area of research that covers a broad spectrum, including sourcing and procurement, conversion (manufacturing), and all logistics management activities. Cultural distance measures have been researched with regards to supplier selection for raw materials and component parts (Aquilon et al 1997), provision of customer value in cross-cultural relationships (Blocker and Flint 2007), operations management (Metters et al 2010), mitigation of supply chain risk (Jia and Rutherford 2010), supply chain partnerships (Selviaridis and Spring 2007) and quality management (Flynn and Saladin 2006). This literature all draw the conclusion that culture is relevant, and that it does matter within the context of the areas investigated. The main thread of these articles, however, is that they set out to determine if culture matters, and in finding that it does, suggest that there should be some adaptation to the local culture.

1.4.3 Call for Future Research in Cultural Distance Measures
Recent literature calls for future research regarding cultural distance and its application in operations management, supply chain management and international business management (Gelfand et al 2007, Pagell et al 2005, Tong et al 2007). Gelfand et al (2007) states that culture needs to be examined in future research from a multilevel perspective to determine how national level cultural values work within and between organisations to determine individual behaviour outcome with regards to situational context. This is further supported by Pagell et al (2005) who highlight that cultural studies need to go beyond the macro level (national measures) and a micro-level focus is required to investigate beyond the ‘does culture matter?’ question.

1.5 Implications for Current Research Project
1.5.1 Uncertainty Avoidance - Hofstede, GLOBE, Venaik & Brewer
In addressing some of the criticism concerning cultural distance measures, Venaik and Brewer (2010) considered the distance measure ‘Uncertainty Avoidance’ (UAI) and its application in the Hofstede and GLOBE frameworks. They identified that the measures are different aspects of the same dimension - namely, UAI-stress (Hofstede), and UAI-rule (GLOBE). Stress refers to role stress, and in their study they evaluated this with respect to the questions asked by Hofstede in his value survey, as well as against data reflecting poverty stress (in comparison to wealth). This is interesting as this adds an economic dimension to the measure. Rule refers to the desirability of rules and laws and the individual’s comfort derived from following them (or uncertainty from not following
them, as the case may be). This split model of UAI-stress and UAI-rule will be evaluated as part of this research.

1.5.2 Mintzberg’s Five Preferred Configurations of Organisations from a Cultural Perspective

In 2010, Hofstede et al evaluated culture with regards to organisational structure, drawing on the work of Mintzberg in linking an organisation’s parts, its activities and configurations. Mintzberg’s framework is mapped to the UAI / PDI matrix, as Hofstede argues that these are the two cultural dimensions that relate strongly to organisations due to their ability to answer the following questions:

- Who has the ability to decide what?
- What rules or procedures will be followed to attain the desired ends?

(Hofstede et al 2010, Chapter 9)

As such, both UAI (-stress and –rule) and PDI cultural distance measures are included in the research design.

2. Research Questions

Due to the complex environment in which multi-national corporations (MNCs) operate, sourcing decisions within the organisational supply chain are also complex (Carter et al 2010). Organisations evaluating criteria for supplier selection consider both geographical and cultural distance as valid supplier selection measures (Oke et al 2009). However in some instances when selecting suppliers, organisations may not be able to avoid high cultural distance due to the limitation of suppliers that meet organisational criteria.

This work aims to contribute to the theory with regards to national cultural influence on decision-making process and implementation within MNCs in logistics outsourcing in the Asia-Pacific region. With considerable international expenditure in 3PL outsourcing internationally - estimated revenues of US$ 541.6 billion annually (Langley 2012) arise from 3PL decisions - it is hoped that by attempting to investigate one of the areas where relationships fail, organisations utilising 3PL services will gain insight into the effect of culture on success in the relationships established. This will be covered through two research questions put to multiple levels within a logistics flow, and the relationship between cultural distance, logistics outsourcing decision-making within international supply chains and the outcomes of the logistics outsourcing relationship will be explored, and identified as clearly related to business practice.

**Research Question 1:** What is the influence of national culture (particularly PDI, UAI-stress and UAI-rule) on logistics outsourcing decision-making and implementation across national borders in multinational corporations (MNCs) in the Asia-Pacific region?

**Research Question 2:** To what extent does national culture affect the acceptance or rejection of new outsourcing relationships outside of the home country?

These questions aim to consider the levels involved in the decision-making process for logistics outsourcing, the structure of the outsourcing that results from those decisions, and the communication of those decisions for implementation. The cultural distance dimensions Power Distance and Uncertainty Avoidance (UAI-stress and UAI-rule) will be considered to determine if these factors play any part in affecting the success of decisions that are made at the global or regional level and implemented in another country.
Participants will be identified, including internal organisational stakeholders (from senior management to staff connected to the 3PL). External stakeholders include customers as well as staff from the 3PL itself. Organisational documents will be examined. The research methods following will be used to address the research questions with the aim of validating the theoretical framework in figure 1.

3. Methodology - Qualitative

It is intended that this study will be of a qualitative method. A case study approach has been selected as this is appropriate when studying managerial processes, because boundaries of the phenomenon and its context are not clearly evident (Yin 1984, García-Arca 2011). This is evident in the complexity of business situations between the organisation, global or regional headquarters and host country branch, the 3PL partner and customer, as well as the complexity of decision model. An embedded design (Eisenhardt 1989) is sought, aiming to touch multiple levels within the supply chain relationships to fully understand the dynamics of the cross-border influence on the multiple levels within the organisation and its outsource 3PL partner.

3.1 Literature Review

The literature review will be an ongoing, detailed review of the available literature surrounding the management theories addressed by the research questions and the case investigation. This will continue to look at cultural distance models, extending this into models that are applicable at the individual level, and in corporate culture as well. One of the limitations of beginning with a literature review is that it can narrow the scope of the investigation to only what is known in the theory (Yin 2010), however due to the experience of the author in the logistics field, as well as the continual literature review process which will allow theory to be continually evaluated, it is hoped that this criticism will be alleviated.

3.2 Selection Survey for Filtering Case Study Participants

There will be an initial survey of interested participants, who will be at senior management level in an organisation. The initial contacts will be of a suitable position that they have the authority to determine partner participation in the research – either 3PL or customers. The purpose of this survey is to determine the demographics of the organisation and qualifying the number of outsourcing partners, countries where there is a presence/relationship, success factors and other key information. This is to ensure participating organisations are similar enough so that comparisons and possibly
generalisations may be drawn from the case studies (Burgess 2000), as well as improving external validity (Eisenhardt 1989).

3.3 Case Study – Interviews and Document Review
The organisational relationships will be investigated, as well as the sites for implementation (both branch and 3PL, as appropriate). The important aspects of the case will be identified and outlined prior to and during the case investigation to try and reduce investigator bias (Yin 2010) and as an ongoing tool to ensure that any additional information that is revealed can be incorporated into the case to ensure the appropriate vigour and validity ensues. The case studies will be developed through the conduct of semi-structured interviews in up to three organisations, using critical incident technique, as well as the review of supporting documents within the organisation. The documents will verify objectively the “success” of the relationship through Key Performance Indicator (KPI) data from the organisation.

4. Conclusion
This research seeks to investigate the influence of cultural dimensions on complex supply chain outsourcing decision-making and implementation across international boundaries. There are criticisms with regards to the application of cultural dimensions individually. However, this research will be conducted on an empirical basis with the goal of determining whether there is a way to extend existing theory beyond the current waves of cultural values surveys, culminating in a model that will inform the decision making process and implementation of those decisions in a way that is relevant to the working environment of multi-cultural teams in a multi-country environment.

It is hoped that this will allow for further research in the area of cultural tools and models for use in multinational environments that are increasingly common in businesses today.

5. References