# Investigating the Differences between Success Factors of Conventional IS Outsourcing and Quasi-Outsourcing

Karin Väyrynen University of Oulu, FIN karin.vayrynen@oulu.fi Marianne Kinnula University of Oulu, FIN marianne.kinnula@oulu.fi

#### **Abstract**

Conventional IS outsourcing does not always meet expectations, sometimes because of a company's lack of control over the outsourced activity. Quasioutsourcing is a form of collaboration where the company transfers its IS personnel to a subsidiary, allowing the company to keep better control over the relationship than in conventional outsourcing. In this paper, the factors affecting the success of a quasioutsourcing relationship are examined in an empirical case study where a Finnish corporate group quasioutsourced its IS services, and are compared to success factors of conventional outsourcing. First, we found that certain factors identified to be critical for success in conventional IS outsourcing are already fulfilled in the context of quasi-outsourcing. Second, we identified a number of success factors of quasioutsourcing not yet identified in conventional outsourcing. Third, we identified three challenges of quasi-outsourcing, and a number of success factors as countermeasures to meet these challenges.

## 1. Introduction

Outsourcing has often been named as one of the most important company business strategies in the era of New Economy. Numerous kinds of collaboration modes between companies have been identified to fulfill that purpose [14]. Quasi-outsourcing, where the company creates a subsidiary and transfers certain business functions to it, having still total or part of the ownership of the new company [11], has not been in the focus of information system (IS) outsourcing research even though it has been a normal practice in industry [11]. There are significant risks related to outsourcing [4][5], and outcomes of outsourcing are not always successful, one reason being that in conventional outsourcing, the company loses control over the outsourced activity [9]. Quasi-outsourcing, however, allows the company to retain control over the outsourced activity [10], and thus seems to represent a good alternative to conventional outsourcing. Success factors of conventional IS outsourcing have been the focus of previous research [30]. However, success factors of IS quasi-outsourcing, and whether and how they differ from success factors of conventional IS outsourcing, have not been studied yet. Our study seeks to close this research gap by examining the case of a Finnish internationally operating corporate group which quasi-outsourced its software development, maintenance and support activities. This study explores the factors which seem to affect the success of IS quasi-outsourcing collaboration and compares them to success factors of conventional outsourcing.

Our research has both theoretical and practical implications. We found that several factors which have been identified in previous research as being critical to the success of conventional IS outsourcing proved to be partly hindering in IS quasi-outsourcing. These factors thus represent challenges for IS quasi-outsourcing collaboration. In addition, we identified several success factors which can help to meet these challenges. Our findings have practical relevance in raising companies' awareness for challenges of IS quasi-outsourcing collaboration and by giving suggestions for how companies can meet these.

In the next section we briefly discuss quasioutsourcing and present success factors for conventional outsourcing. After that we introduce the research setting and methodology. The results of the empirical study, i.e. the success factors identified in the quasi-outsourcing case, are presented in section 4. The main findings of the study are discussed in the fifth section, and the paper concludes by presenting theoretical and practical implications, research limitations and suggestions for future research.

#### 2. Related research

One of the key areas in IS outsourcing research is the strategic intent behind companies' outsourcing decisions, and different kinds of motivations for outsourcing have been identified [30]. The leading driver behind outsourcing decisions is, by far, the expectation to both reduce IS costs and gain better control over them [30]. Other frequently mentioned motivations include acquiring from other companies the competences that the company needs but does not have – and does not want to have – in-house, focusing on the company's core competences, and improving business or process performance of the company [30].

#### 1.1. Quasi-outsourcing

Quasi-outsourcing is rarely discussed in IS outsourcing literature even though it is a widely used practice in industry (e.g. in a survey of 99 German companies, 46.5% were found to use quasi-outsourcing instead of conventional outsourcing [10]). In quasi-outsourcing, the company creates a subsidiary and transfers all or part of its internal IS department to it, and the resulting company behaves as an external service provider to the parent company [11]. The new company is independently managed and has considerable autonomy, although the parent company maintains total or partial ownership [2][10][11].

Barthélemy and Geyer [11] use transaction cost economics (TCE) theory to explain the benefits of quasi-outsourcing. According to Barthélemy and Geyer "quasi-outsourcing is a hybrid structure or governance that lies between market and hierarchy [44]", and as such is a way to balance market and organizational transaction costs [11]. Even though the quasi-outsourced IS department behaves like an external service provider to the parent company, the parent company still has better control of the outsourced activities than in a conventional outsourcing situation [10]. Similar types of relationships have been successfully used in Japan as well [2][22][36].

# 1.2. Success factors of IS outsourcing relationships

Even though general success factors of outsourcing relationships have been discussed extensively in the IS literature [30], success factors of quasi-outsourcing relationships have not been specifically examined. Thus, we rely on the general IS outsourcing research and base our analysis on it.

Answers to the question "What makes an outsourcing relationship between two companies successful?" have come in different formats. What is common to most of the answers is that they draw on data from empirical evidence, by trying to understand and model real-life cases. Researchers have tried to find the answers by posing other questions like "What does relationship success mean?" [20][34][38], "What

are the reasons for getting involved in an outsourcing relationship?" [6][15][35][37][40], "What were the factors that caused relationships to fail?" [3][29], "What are the risks of outsourcing and how to mitigate them?" [5][13][17], or "What kind of a process leads into a successful relationship?" [27][32][41]. The results have been rather unified and it seems that most successful collaborative relationships are based on immaterial factors like trust between the parties and communication, as well as material factors, such as good contracts or good personnel. Immaterial factors are often hard to measure, and they can also be more easily violated and lost.

Even though outsourcing success seems to be partly based on factors that cannot be easily measured, it is beneficial to understand which of the factors can be measured and how, to possibly get some hard data of the relationship success. We have thus divided the success factors into being somehow related to the business (hard factors that can be measured in relation to original goals and expectations and in terms of money), related to the structural issues (hard, concrete structures, processes and techniques that can be evaluated and assessed with e.g. process assessment methods), or being value-based, immaterial, often relationship related factors (soft, people-dependent factors that cannot be easily evaluated or measured) (adapted from [28]).

As relationship success is tightly tied to the realization of risks, some researchers have seen certain factors as risks in the relationship, while others have listed the same as success factors of the relationship. To better understand what determinants influence success of the relationship, we combined the most common risk factors presented in IS outsourcing literature with the success factors (both presented in [30]), and classified them as displayed in Table 1. The degree of criticality (as defined by Williams and Ramaprasad [43]) of these factors can be considered to be 'necessary for success of the relationship' or 'associated with success'.

The business related factors include selective outsourcing (how big amount of IS budget or number of IS functions is outsourced) [31][32], understanding and managing all costs related to the outsourcing relationship (including e.g. transaction costs, hidden management costs, switching costs to another service provider, possible cost savings, contract growth controlling) [4][21][25][33], and service provider financial stability (service provider will not e.g. go out of business) [17].

Of the structural factors, the importance of the relationship management process cannot be emphasized enough. It includes such vital issues as communication [34], information sharing [34] and

cooperation processes [20], as well as acquainting the customer's own employees to the new relationship to prevent any backlash [7].

Table 1. Success factors of IS outsourcing relationships

Business related factors	Structural factors	Value-based factors	
Selective outsourcing [31][32]	Relationship management process [7][20][34]	Support from top management throughout the process [40]	
Understanding and managing all costs [4][21][25][33]	Service provider evaluation process [31]	Trust [16][25][38]	
Service provider financial stability [17]	Contractual governance [24][30]	Norms and values [23][42]	
	Retention of essential skills [6][17]	Open sharing of information [34]	
	Retention of control over outsourcing [13]	Cultural fit between parties [15]	
	Quality of service [8][12][15]	Mutual dependency [13]	
	Avoidance of transition failures [27]		

Other structural factors mentioned in previous research are careful evaluation of the service provider [31], and contractual governance where a detailed but flexible contract, short duration of contract and higher contract size positively affect the outcome of the relationship [30], and where the customer retains control over the service provider [24]. Taking care that essential skills and key persons are not outsourced is important [6][17], as is also the retention of control over outsourcing (e.g. autonomy and control over information technology (IT) decisions, control over data) [13]. Quality of service includes such factors as capability, skills and attitude of the service provider [8][15], also honoring the IP rights, and security and privacy issues [12]. Failure in transition of the outsourced work to the service provider understandably affects success of the relationship [27].

Of the value-based factors, top management commitment and support is seen as critical to the relationship success [40]. The general agreement is that, to be successful, the whole relationship has to be based on trust. Trust is built in different ways and all the above-mentioned factors affect it. It can be given based on earlier experiences or references, but it also has to be earned. It is not easy to rebuild trust once it has been lost. [16][25][38]

Other value-based factors mentioned include e.g. norms [23] and values (e.g. treating IT as an

undifferentiated commodity [42]), open sharing of information [34], fit in organizational cultures – i.e. cultural fit between parties [15], and a healthy amount of mutual dependency between parties [13].

Understanding what factors generally affect the success of the relationship is of course important. However, the factors of success in a certain relationship are highly dependent on what is expected as being the successful outcome of the relationship. Thus, following Anthony et al.'s [1] emphasis on the need to tailor management control systems to company's particular strategic objectives, we define successful outsourcing to be the situation where the objectives and expectations set for the outsourcing are met.

# 2. Research setting and methodology

The research was conducted as an empirical, qualitative case study to get an in-depth understanding of the phenomenon and success factors of quasi-outsourcing. A case study is suitable for research that is trying to answer "how" and "why" questions about a contemporary phenomenon within its real-life context, especially when the boundaries between phenomenon and context are not clearly evident [45], as it is the case in quasi-outsourcing.

#### 2.1. Case description

In this research the case of quasi-outsourcing collaboration between a Finnish internationally operating corporate group (called Alpha in this research) and its software subsidiary (called Omega in this research) was studied over a period of 2.5 years from 2006 to 2008. From the 1980s to 2006, development, support and maintenance of the company's internal software (SW) applications and systems was handled mostly within a limited number of operational departments inside Alpha. In 2006, Alpha moved almost all of its operational departments' SW developers, 30 persons, to Omega, a subsidiary Alpha had established in 2000. Legally Omega was an independent SW company, but it offered its SW development, maintenance and support services almost exclusively to Alpha. Alpha fully owned Omega, but Omega was empowered to behave like an external vendor, thus this case fulfills the definition of quasioutsourcing. A large part of the software developers were transferred from Alpha's IT department, and from the EA-department, one of Alpha's operational departments.

Alpha's objective with quasi-outsourcing was to reduce costs and gain better control over them, and to

improve the SW development, support and maintenance process performance by allowing a larger number of departments and companies in the Alphagroup access to these resources. Before the transfer of the SW developers to Omega, a large part of these resources had represented fixed costs for the operational department the SW developers had been located at. After the transfer, these costs could be spread over a larger number of departments and companies, creating economies of scale.

#### 2.2. Data collection methods

Our study is part of a larger research project we conducted on industrial companies' software business activities. One of the cases we studied, i.e. the Alpha-Omega relationship, represented quasi-outsourcing, and the empirical data collected in connection to this case offered the basis for the present research. Outsourcing studies are often conducted either from the point of view of the customer or the service provider. In order to get richer understanding of the phenomenon we collected data from both parties of the relationship.

Primary data collection was done by interviewing six persons in ten in-depth interviews in Alpha and Omega. Interview topics included objectives of quasi-outsourcing, changes in capabilities and collaboration processes necessary in both the quasi-outsourced and the parent company, and difficulties and success factors in implementing these changes. In order to gain rich insights from both the service provider's (Omega) and customer's (Alpha, EA-department) perspectives, we interviewed persons from a number of different organizational positions.

The interviewees were Omega's CEO (CEO), one of the software developers who were transferred from Alpha's EA-department to Omega (SW Dev), Alpha's data administration manager (DAM), Alpha's group risk manager (RM), and two employees of the EA-department (EA 1 and EA 2).

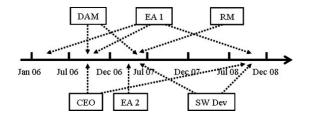


Figure 1. Timeline of interviews

Figure 1 shows the timeline of interviews, each arrow representing one interview. In one of the

interviews, both Omega's CEO and Alpha's data administration manager were present, the other interviews were conducted with one interviewee at a time. We started our interview series one month after Alpha had quasi-outsourced its SW development, support and maintenance activities and followed the quasi-outsourcing progress over the next 2.5 years. Table 2 gives an overview of the interviews conducted.

Table 2. List of interviews

Company	Interviewee	Date	Duration
Alpha	EA 1	Apr 06	1:12:12
Alpha, Omega	DAM, CEO	Sept 06	1:25:17
Alpha	EA 1	Sept 06	0:41:20
Omega	SW Dev	Apr 07	3:01:35
Alpha	EA 2	May 07	0:52:13
Alpha	RM	Jun 07	1:39:43
Alpha	DAM	Jun 07	1:21:01
Alpha	EA 1	Oct 08	1:17:43
Omega	CEO	Oct 08	1:03:33
Omega	SW Dev	Oct 08	2:08:11

## 2.3. Data analysis

Our data analysis followed Eisenhardt [18] and Yin [45]. All interviews were conducted in an open interview setting with semi-structured questions and were transcribed, amounting to 183 pages of text. Each interview was analyzed and success factors important for achieving the objectives Alpha pursued with quasioutsourcing identified. We coded the data in NVivo and used the preliminary set of success factors of conventional outsourcing (see Table 1) as pre-codes. In addition to several success factors already known from previous research, we were able to identify a number of new ones. Next, we compared the service provider's and customer's views to find out whether and how the service provider's and customer's views on these success factors differed. Finally, we compared success factors of the quasi-outsourcing relationship with the success factors of conventional IS outsourcing relationships to identify similarities and differences.

#### 3. Results

In this section, we present the success factors (in bold letters) we were able to identify in this quasioutsourcing case. We distinguished business, structural and value-based factors. Alpha and the EA-department will at times also be referred to as the *customer* or the *parent company*, Omega as the *service provider*.

#### 3.1. Business related factors

Alpha had a long-term perspective in mind when deciding to quasi-outsource its SW development, support and maintenance personnel to Omega. One objective of the transfer of personnel was to improve the use of these human resources and the know-how they represented in the long-term. Alpha was satisfied with Omega's service and performance. Alpha's data administration manager said, "In my opinion, the customers in Alpha have a lot of trust that Omega do what they promised, and that they know what they are doing." On the other hand, Omega's CEO mentioned that especially in the beginning, in many projects the schedule didn't hold, cost estimations were too low, and the end result was not what the customer wanted.

Another of Alpha's main objectives behind quasioutsourcing was to create economies of scale by changing the cost structure of SW development: "With this change, fixed costs are turned into variable costs. Variable costs have to be handled differently, and budgeting is different now". To achieve this, Alpha had to increase both SW developers' and customers' awareness for the costs that SW development causes: "Now they consider which things they really want to get developed, because all SW development costs money. If they decide not to have it [a SW application] developed, they save money." Omega conducted a lot of fixed-price projects, and added – as agreed with Alpha – only a small margin to the actual person-hour costs in hour-based pricing. If Omega underestimated the time needed for developing e.g. a certain SW application in a fixed-price project, the company had to carry these additional costs. Correspondingly, Alpha's operational departments had to pay extra in case they wanted to have something developed which had not been agreed on. As Alpha's data administration manager said: "That's new for the customer organizations, that they do not any more get all the changes they would like to get. They have to specify what they want, and Omega develops what was specified. If the customers then want changes, they have to pay more. Also before they had to pay more, but they didn't understand that. It was like 'James is now developing this application, he just needs a bit longer than he had planned'."

#### 3.2. Structural factors

One of the most important structural factors to achieve a more efficient use of SW development resources was the creation of **structured communication and interaction processes** both inside Omega, and between Alpha and Omega. Omega

started a project to develop the guidelines for conducting SW development projects. Within this project Omega defined, for example, what kind of meetings should be held and what kind of documents they should use. However, according to Omega's CEO the project initially failed for several reasons: "We tried to do it too fast with a too fancy process. The persons who developed the process were not very experienced. The scheme didn't work because it was too complicated. We didn't force our employees to support this, didn't encourage them to participate, partly because we didn't yet know how we really should conduct projects". After this failure, Omega put the project on hold and concentrated on gaining experience in how to conduct these SW development projects. In 2008, Omega restarted the project, this time reserving a longer time span than before for the project and planning to define work processes based on the experiences gained during the past two years.

When the SW developers were still part of the operational departments, there was no need to make clear requirement specifications, as the developers and customers were so close to each other. One of Alpha's objectives had been to improve the performance of SW development, support and maintenance processes. This was tried to be achieved by defining requirements better and in a more structured way and by creating traceability of costs. Alpha's operational departments had to start to make **SW requirement specifications**. SW developers in Omega then had to estimate how long it would take to develop of a certain application.

Omega had to create traceability of the costs, i.e. the time spent on developing a certain application and the time used for maintenance and support of a SW system. Two years after the SW developers were quasioutsourced, one of Omega's SW developers explained: "Requirement specifications have improved, as we are now selling our know-how. Previously, when we were part of the organization that both sold and bought our services, the projects were very vague. There was no need to make exact specifications. [...] Now, when we sell 5000 hours, and we sell some SW application, we have to have a quite good understanding of what we are selling, in order to get it done within these 5000 hours. So the quality of the documentation and preassessment improved." According to Omega's CEO, two years after the transfer people had started to make requirement specifications, operations had become a bit more systematic, and flexibility had increased the use of SW development resources in connection with new technologies. However, he said these processes were not yet at the level Omega was trying to achieve.

In connection to this it was essential to **promote** and explain the idea of the quasi-outsourcing process. Alpha group's risk manager said that only

lately people had started to understand that this was now a different way of working. Alpha's data administration manager explained: "Many people said they haven't felt to be part of this process. Now that we tell them that we want them to be part of this process, they are contented. [...] Whether they'll also start to work as part of this process [...] will depend on us, on whether we'll be able to 'sell' this idea."

The resolution of conflicts between Alpha and Omega in this collaboration was seen to be easier than it would have been with an external service provider. Omega was a "preferred partner" for Alpha with whom making contracts was easier than it would have been with an external supplier. As Alpha's data administration manager explained: "The risk is very small for the customer organization. The commercial aspect is much easier if some quarrel or disagreement about the contract arises. Then it's like fighting within the family, which is much easier. You always find a 'judge' inside the Alpha corporate group. Everything related to contracting is much smaller in this kind of [quasi-outsourcing] collaboration. With external suppliers you really have to make tight contracts to get what you ordered."

#### 3.3. Value-based factors

The idea for quasi-outsourcing came from Alpha, and after two months of negotiations with Omega, the companies reached a common understanding and the SW developers were transferred. Thus, both Alpha's and Omega's top management supported the quasioutsourcing decision. However, what seemed to be at least as important was to get the support and commitment of the transferred SW developers and operational departments which the developers were taken from, e.g. the EA-department. As described above, the SW developers' former hosting departments were supposed to change the way they ordered software, to save costs by better considering what kind of software they really wanted developed, and to make requirement specifications. The SW developers, on the other hand, had to improve their estimations of how long the development of a certain application would take and had to be accountable for the time they actually spent on developing that application. As mentioned in Section 4.2, whether Alpha's objectives with quasi-outsourcing could be reached depended on whether Alpha and Omega would be able to sell this idea to the parties involved.

Customers trusted that Omega would deliver what they had promised (see Section 4.1). In addition, a **high level of trust** between Alpha and Omega existed because the SW developers had been part of the customer organization, Alpha, for such a long time.

Because of the fact that Omega's SW developers had been integrated in Alpha's operational departments for years before the transfer, cultural fit between these two parties after the SW developers' transfer was high. Especially the SW developers in the EAdepartment had been working closely with the customers for many years, without the customer having to make software specifications, and without the software developers having to give exact schedule and resource estimations. Half a year after the transfer, both Alpha and Omega still were of the opinion that no big changes had yet happened. One customer from the EA-department said: "All of them are old work colleagues, so how would it change? At least the collaboration didn't change at all." Also two years after the transfer, one of the transferred software developers explained: "From my perspective, the culture has not yet changed sufficiently. The customers still see us as part of them. They don't see that we are a different organization now."

There also existed strong mutual dependency between Alpha and Omega. Omega was dependent on Alpha, because Alpha represented Omega's key target market to which Omega could offer added value compared to some external service provider. As Omega's CEO explained: "Alpha represents a market to which we can offer a clear additional value. On the external market we would just be one amongst many, but when selling to Alpha, we know their IT infrastructure, we know how Alpha conducts its core business, and thus offer them a clear added value compared to some external [service provider]." Respectively, Alpha was dependent on Omega, too. After the transfer of the SW developers, Omega possessed critical know-how concerning the further development, maintenance and support of Alpha's internal SW systems. In addition, the part of Alpha's organization which most of the SW developers had been transferred from, did not have the freedom to purchase SW development, support and maintenance services from outside service providers. As Omega's CEO said: "Concerning the EA-department, in practice we still have a monopoly. For them it's difficult to buy [SW services] somewhere else." Alpha's data administration manager told: "The EAdepartment is only in theory allowed to buy somewhere else, but not in practice. In practice, Omega has the monopoly."

#### 4. Discussion

We want to emphasize three main findings of our comparison of success factors of conventional outsourcing and quasi-outsourcing. First, we found that

several success factors of IS outsourcing collaborations identified in previous research are already fulfilled in the specific context of IS quasi-outsourcing. Second, we identified several success factors that proved to be critical in quasi-outsourcing collaboration but that have not yet been identified in the context of conventional IS outsourcing. Third, a number of factors identified in previous research to be success factors of conventional IS outsourcing have to be seen more critical in IS quasi-outsourcing, as they represent challenges in IS quasi-outsourcing collaboration. We argue that certain success factors identified in both previous and the present research can help to meet those challenges.

# 4.1. Success factors of conventional outsourcing which are fulfilled in the context of quasi-outsourcing

In quasi-outsourcing, the quasi-outsourced service provider has previously been part of the customer, i.e. the parent company. As recent research has recognized, in quasi-outsourcing the subsidiary has greater familiarity with the parent company than an external service provider would have [36]. Our research supports this observation. Building on this, we found that because of this specific setting, especially value-based factors identified in past research to be critical for the success of conventional IS outsourcing are likely to be already fulfilled at the outset of quasi-outsourcing.

quasi-outsourcing, the service provider's personnel had previously been part of the customer organization. Our research showed that for this reason, the success factor of cultural fit between the parties is fulfilled, and a higher level of trust exists in the customer company than when starting the collaboration with an external service provider. In our case study, contractual governance was described as being easier than it would have been in conventional outsourcing. Previous research identified contracts as formal and trust as informal safeguards of opportunism [11]. Thus, we argue that the higher level of trust between the quasi-outsourcing partners results in a less complicated contractual governance. However, also other factors apart from trust - e.g. whether the software provider solely serves the parent company or whether it also services external customers - influence on the level of contractual governance between quasi-outsourcing partners.

In quasi-outsourcing, **mutual dependency** of the parties involved exists. Past-research distinguishes between profit- and cost-centers [11]. The level of mutual dependency between service provider and customer in quasi-outsourcing collaboration depends

on whether the service provider represents a profit- or cost-center for the parent company. This, in turn, is dependent on whether the software provider has, in addition to the parent company, also external customers [36]. In our case, the service provider did not offer its services to customers outside the Alpha corporate group, and thus represented a cost-center. Based on the results of our research, we argue that a quasi-outsourced service provider is less dependent on the parent company if it also serves external customers than if the parent company represents its whole market. Some researchers even say that quasi-outsourced IS departments can only be successful if they can attract a sufficiently large number of external customers [11]. We do not quite agree with this view, as the parent company's objective of quasi-outsourcing has to be considered as well when evaluating the success of quasi-outsourcing.

# 4.2. New success factors identified in the context of quasi-outsourcing

When comparing our results to success factors of conventional outsourcing, we were able to identify a number of success factors not yet discussed in previous research. First, getting both **IS personnel's and customers' support and commitment throughout the quasi-outsourcing process** proved to be essential in our case. Past research on outsourcing success factors has focused on the importance of management support [40]. Our research, on the other hand, found that support and commitment of employees in both companies is an even more important success factor of quasi-outsourcing. We believe that this is a critical issue in conventional outsourcing, too.

Second, our research showed that by **promoting** and explaining the idea and objectives of quasioutsourcing to employees in both the service provider and parent company, employees are more likely to support the quasi-outsourcing activities.

Third, it was crucial to **raise employees' awareness for the costs of IS services**. Past research has focused on the success factors of understanding and managing all costs – e.g. transaction costs, hidden management costs, and switching costs – from a management perspective [4][21][25][33]. However, our research showed that in order to make quasi-outsourcing successful, also employees' awareness of the costs involved with IS services has to be raised in order to make the quasi-outsourcing efforts successful. This was especially important in those departments the IS personnel had been transferred from. For these departments, quasi-outsourcing felt like a change for the worse, as employees of the operational departments

felt like they were 'robbed' of their resources and simply were not aware that their 'internal' SW developers represented high costs for the department.

Fourth, the **creation of structured communication and interaction processes** between the service provider and the parent company proved to be essential for making quasi-outsourcing collaboration work. The definition of a clear requirement engineering process helped these efforts.

# 4.3. Challenges in quasi-outsourcing

Previous research has identified the quality of the service [8][12][15], support of top management throughout the process [40], and cultural fit between IS supplier and customer [15] to be success factors of outsourcing. A comparison of these factors to the results of our empirical case analysis shows that in the context of quasi-outsourcing, these factors have to be seen more critically.

The customer's satisfaction with the service is, naturally, a success factor of almost all types of collaboration. However, in a quasi-outsourcing relationship, the level of what is deemed 'satisfactory' by the parent company might be lower than it would be when collaborating with an external service provider. This became evident when comparing the customer's and service provider's view on the Omega's performance level (see Section 4.1.). The parent company seems to be more 'forgiving' when it comes to the quasi-outsourced service provider. The customer company, thus, might have to pay special attention to demand the quasi-outsourced service provider to deliver a level of performance comparable to an external service provider. The success factor of understanding and managing all costs related to the outsourcing relationship identified in previous research on conventional outsourcing [4][21][25][33] can help to meet this challenge.

As discussed above, cultural fit between the service provider and the parent company in quasioutsourcing exists already because the service provider has previously been part of the customer organization, i.e. the parent company. However, our research uncovered that this also has several negative effects quasi-outsourcing representing challenges in collaboration. In our case, the parent company explicitly wanted to improve the efficiency of using its SW development resources, which demanded the development of structured communication and interaction processes, including the definition of a clear requirement engineering process. This turned out to be difficult particularly because of the fact that SW developers and customers had been working together for a long time and had developed certain ways of interacting with each other. At the beginning of the quasi-outsourcing relationship, neither SW developers, nor customers expected their way of interaction and collaboration to change, which shows a certain lack in the employees' support of and commitment to these change efforts. As discussed above, we identified several success factors in our research which were critical for the success of quasi-outsourcing. These success factors proved to be suitable means to meet the challenges caused by the cultural fit between service provider and customer. In addition to the development of structured communication and interaction processes, increasing both SW developers' and customers' awareness for the costs of SW development, maintenance and support helps them to understand the necessity for changing their old way of working.

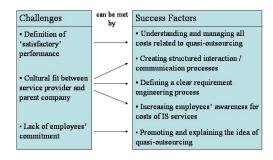


Figure 2. Challenges of a quasi-outsourcing relationship and how to meet them

Because employees of service provider and parent company had been working within the same company before and were not thrilled about the change, a lack of employees' commitment to the quasi-outsourcing efforts proved to be another big challenge for the success of quasi-outsourcing. We found that promoting and explaining the idea of quasi-outsourcing is a success factor that helps to increase employees' support and commitment to the quasi-outsourcing process. Figure 2 shows the challenges of quasi-outsourcing, and the success factors that can, based on our research results, be used to meet them.

#### 5. Conclusions

This paper has examined data collected in a case study of IS quasi-outsourcing in a Finnish internationally operating corporate group. The aim was to find out if and how success factors of quasi-outsourcing differ from those of conventional outsourcing collaboration. We found that several success factors of conventional outsourcing are already fulfilled in quasi-outsourcing, whereas others might be

hindering in quasi-outsourcing and thus have to be seen more critical. We also identified a number of additional success factors not yet identified in the context of conventional outsourcing.

This study has some concrete implications for practice related to quasi-outsourcing of IS. Our findings help companies that decide to practice quasioutsourcing to be better prepared for the challenges of quasi-outsourcing and to avoid certain problems they would encounter if relying on the success factors of conventional outsourcing. Our findings revealed that the parent company might have to pay special attention to defining what is deemed to be satisfactory performance, and to demand the quasi-outsourced service provider to deliver a level of performance comparable to an external service provider. It was also noted that it is not enough that company top management supports the outsourcing, but has to make employees on all organization levels understand why and how quasi-outsourcing is useful. Company internal processes, such as requirement engineering and communication processes, need to support collaboration with the service provider.

Even though this was a single case study conducted in one country, Finland, the results give some indication that there indeed are some differences between success factors of conventional outsourcing and quasi-outsourcing relationships. A natural future research topic would be to use the results of this study as hypotheses, and to test them further in order to establish their validity. It would also be interesting to investigate which capabilities the different parties need to fulfill the success factors of an IS quasi-outsourcing relationship.

## 6. References

- [1] R.N. Anthony, J. Dearden, and R.F. Vancil, "Key economic variables", Management Control Systems, Homewood, Irwin, IL, 1972, pp. 138-143.
- [2] M. Aoki, "Towards an economic model of the Japanese firm", Journal of Economic Literature, 28, 1990, pp. 1-27.
- [3] B.A. Aubert, S. Dussault, M. Patry, and S. Rivard, "Managing the risk of IT outsourcing", In: Proceedings of the Thirty-second Annual Hawaii International Conference on System Sciences, 1999.
- [4] B.A. Aubert, M. Patry, and S. Rivard, "A framework for information technology outsourcing risk management", Database for Advances in Information Systems, 36 (4), 2005, pp. 9-28.

- [5] B. Bahli and S. Rivard, "Validating measures of information technology outsourcing risk factors", Omega 33 (2), 2005, pp. 175–187.
- [6] L. Baldwin, Z. Irani, and P. Love, "Outsourcing information systems: Drawing lessons from the banking case study", European Journal of Information Systems, 10, 2001, pp. 15-24.
- [7] S. Bandyopadhyay and P. Pathak, "Knowledge sharing and cooperation in outsourcing projects A game theoretic analysis", Decision Support Systems, 43, 2007, pp. 349–358.
- [8] J. Barthélemy, "The hard and soft sides of IT outsourcing management", European Management Journal, 21 (5), 2003, pp. 539-548.
- [9] J. Barthélemy, "The seven deadly sins of outsourcing", The Academy of Management Executive, 17 (2), 2003, pp. 87-100.
- [10] J. Barthélemy and D. Geyer, "IT outsourcing: Evidence from France and Germany", European Management Journal, 19 (2), 2001, pp. 195–202.
- [11] J. Barthélemy and D. Geyer, "An empirical investigation of IT outsourcing versus quasi-outsourcing in France and Germany", Information & Management, 42 (4), 2005, pp. 533–542.
- [12] W. Currie, V, Michell, and O. Abanishe, "Knowledge process outsourcing in financial services: The vendor perspective", European Management Journal, 26 (2), 2008, pp. 94-104.
- [13] W. Currie and L. Willcocks, "Analyzing four types of IT sourcing decisions in the context of scale, client/supplier interdependency and risk mitigation", Information Systems Journal, 8 (2), 1998, pp. 119–143.
- [14] J. Dibbern, T. Goles, R. Hirschheim, and B. Jayatilaka, "Information systems outsourcing: A survey and analysis of the literature," Database of Advances in Information Systems, 35 (4), 2004, pp. 6-102.
- [15] A. DiRomualdo and V. Gurbaxani, "Strategic intent for IT outsourcing", Sloan Management Review, 39 (4), 1998, pp. 67–80.
- [16] S. Domberger, The Contracting Organization A strategic guide to outsourcing, Oxford University Press, Oxford, 1998.
- [17] M. Earl, "The risks of outsourcing IT", Sloan Management Review, 37 (3), 1996, pp. 26–32.
- [18] K.M. Eisenhardt, "Building theories from case study research", The Academy of Management Review, 14 (4), 1989, pp. 532-550.

- [19] J. Fisher, R. Hirschheim, and R. Jacobs, "Understanding the outsourcing learning curve: A longitudinal analysis of a large Australian company", Information Systems Frontiers, 10 (2), 165-178.
- [20] V. Grover, M. Cheon, and J. Teng, "The effect of service quality and partnership on the outsourcing of information systems functions", Journal of Management Information Systems, 12 (4), 1996, pp. 89–116.
- [21] V. Ho, S. Ang, and D. Straub, "When subordinates become IT contractors: Persistent managerial expectations in IT outsourcing", Information Systems Research, 14 (1), 2003, pp. 66-125.
- [22] K. Ito, "Japanese spinoffs: Unexplored survival strategies", Strategic Management Journal, 16 (6), 1995, pp. 431-446.
- [23] T. Kern and K. Blois, "Norm development in outsourcing relationships", Journal of Information Technology, 17 (1), 2002, pp. 33-42.
- [24] T. Kern and L. Willcocks, "Contract, control, and "presentation" in IT outsourcing: Research in thirteen UK organizations", In: F. Tann (Ed.) Advanced Topics of Global Information Management, London, Idea Group Publishing, 2002, pp. 227-249.
- [25] T. Kern and L. Willcocks, "Exploring information technology outsourcing relationships: Theory and practice," Journal of Strategic Information Systems, 9, 2000, pp. 321-350.
- [26] W. King, "Outsourcing and the future of IT," Information Systems Management, 21 (4), 2004, pp. 83-84.
- [27] M. Kinnula, "The formation and management of a software outsourcing partnership: A case study", Acta Universitatis Ouluensis Scientiae Rerum Naturalium A 451, 2006. Online http://herkules.oulu.fi/isbn9514279832/
- $[28]\,M.$  Kinnula and S. Juntunen, "A case study of success factors in outsourcing partnership formation and management", In: Proceedings of IMP conference, Rotterdam, Netherlands, September 2005.
- [29] M. Lacity, R. Hirschheim, and L. Willcocks, L., "Realizing outsourcing expectations", Information Systems Management, 11 (4), 1994, pp. 7–18.
- [30] M. Lacity, S. Khan, and L. Willcocks, "A review of the IT outsourcing literature: Insights for practice", Journal of Strategic Information Systems, 18, 2009, pp. 130–146.
- [31] M. Lacity and L. Willcocks, "An empirical investigation of information technology sourcing practices: Lessons from experience", MIS Quarterly, 22 (3), 1998, pp. 363–408.

- [32] M. Lacity, L. Willcocks, and D. Feeny, "The value of selective IT sourcing", Sloan Management Review, 37 (3), 1996, pp. 13-25.
- [33] M. Lacity, L. Willcocks, and D. Feeny, "IT outsourcing: Maximize flexibility and control", Harvard Business Review, May-June 1995, pp. 84-93.
- [34] J-N. Lee and Y-G. Kim, "Effect of partnership quality on IS outsourcing success: Conceptual framework and empirical validation", Journal of Management Information Systems, 15 (4), 1999, pp. 26-61.
- [35] L. Loh and N. Venkatraman, "An empirical study of information technology outsourcing: Benefits, risks, and performance implications", In: Proceedings of the 16<sup>th</sup> International Conference on Information Systems, Amsterdam, Netherlands, 1995.
- [36] S. Matsuno, T. Ito, Y. Uchida, and S. Tagawa, "An empirical investigation of IS outsourcing in Japan", International Journal of Education and Information Technologies, 3 (2), 2009, pp. 105-114.
- [37] J.B. Quinn, "Strategic outsourcing: Leveraging knowledge capabilities", Sloan Management Review, 40 (4), 1999, pp. 9–21.
- [38] R. Sabherwal, "The role of trust in outsourced IS development projects", Communications of the ACM, 42 (2), 1999, pp. 80-86.
- [39] C. Saunders, M. Gebelt, and Q. Hu, "Achieving success in information systems outsourcing", California Management Review, 39 (2), 1997, pp. 63-79.
- [40] H. Smith and J. McKeen, "Developments in practice XIV: IT outsourcing how far can you go?", Communications of the AIS, 14, 2004, pp. 508–520.
- [41] N. Venkatraman, "Beyond outsourcing: managing IT resources as a value center", Sloan Management Review, 38 (3), 1997, pp. 51-64.
- [42] L. Willcocks and T. Kern, "IT outsourcing as strategic partnering: The case of the UK Inland Revenue", European Journal of Information Systems, 7 (1), 1998, pp. 29-45.
- [43] J.J Williams and A. Ramaprasad, "A taxonomy of critical success factors", European Journal of Information Systems, 5, 1996, pp. 250-260.
- [44] O. Williamson, "The Economic Institutions of Capitalism", New York, Free Press, 1985.
- [45] R.K. Yin "Case Study Research", Thousand Oaks, SAGE Publications Ltd., 1994.