

The Contribution of Service Quality and Partnership Quality on IT Outsourcing Success

¹Mohamad Noorman Masrek, ²Mohd Zhahir Yaacob, ³Mohd Ridwan Seman, ⁴Azman Ibrahim

¹Accounting Research Institute / Faculty of Information Management University Technology MARA, Shah Alam, Selangor, Malaysia

^{2,3,4} Faculty of Information Management, University Technology MARA, Shah Alam Selangor, Malaysia

¹mnoorman@salam.uitm.edu.my, ²mohdzhahir.yaacob@yahoo.com, ³mridwan@salam.uitm.edu.my, ⁴azman690@salam.uitm.edu.my

ABSTRACT

IT Outsourcing is as an act of predetermined subcontracting part or all a firm's IT function to one or more external vendor. With the increased competitive pressures, many business enterprises have diminished their operating costs and create new opportunities through outsourcing. Given the dearth of study on outsourcing from the employee perspectives, this study reports the finding factors influencing outsourcing success. Employing a survey research methodology involving 60 employees of a company that heavily involved in outsourcing activities, the results show that both partnership quality and service quality are significant predictors of outsourcing success. This study provides empirical evidence from the user perspective on the importance of partnership quality and service quality in ensuring outsourcing success.

Keywords: *Outsourcing, service quality, partnership quality, survey, Malaysia.*

1. INTRODUCTION

With the increased competitive pressures, many business enterprises have diminished their operating costs by creating new opportunities through outsourcing. By definition, IT outsourcing is as an act of predetermined subcontracting part or all a firm's IT function to one or more external vendor [12, 17]. It can also be described as the transfer of services or functions previously performed within the organization to a provider outside of the organization and are increasingly key components in many business strategies [4].

Prior research into IS outsourcing phenomenon focused on: (a) determinants, costs/benefits, and advantages/ disadvantages of outsourcing (i.e. addressing the issue of 'why') (b) outsourced functions/activities (i.e. addressing the issue of 'what') (c) sourcing arrangements (addressing the issue of 'which') (d) vendor evaluation and relationship building (i.e. addressing the issue of 'how') and; (e) outsourcing success (addressing the issue of 'outcome') [5]. Most of the previous studies of IT outsourcing were mainly focusing on the service receiver perspective. The unit of the analysis of these studies was firm level and IT managers were normally engaged as respondent representing the firm. Very few studies have engaged employees of the firm to assess the success of IT outsourcing.

Despite the widespread IT outsourcing practice both in the private and public sectors in Malaysia, research on this phenomenon was not very extensive. Success stories in IT outsourcing are also very limited which lead to scepticism whether the numerous large-scale IT outsourcing projects were beneficial [8]. While several studies focusing on outsourcing have been conducted in Malaysia, most of them were done at the firm level and not at the employee or end-user level (e.g. see [8, 14])

Given the dearth of studies on outsourcing from the employee perspectives, this study attempts to fill the gap by assessing outsourcing success and its contributing factors from the employee of the service receiver company in the context of Malaysia. Specifically, the research objectives of the study are (i) to measure the success of outsourcing practices, (ii) to measure the level of service quality of the service provider, (iii) to measure the level of partnership quality between service provider and receiver, (iv) to identify the relationship between service quality and outsourcing success, and (v) to identify the relationship between partnership quality and outsourcing success

2. LITERATURE REVIEW

IT outsourcing relationships can be divided into four different engagements (i) single vendor - single client – typically for simple functions or update of some information system components; (ii) single vendor - multiple clients – is usually to application development when a single vendor assure the implementation and maintenance for multiple business with comparable features; (iii) multiple vendors - single client – can be found at the large companies which outsource entire information system development and maintenance to the different provider; and (iv) multiple vendors - multiple clients – can be seen on e-business context where multiple companies on the value chain co-operate. In this context, each business could contract one or more partners from value chain to outsourcing IT [7].

The literature suggests that firms engage into IT outsourcing because of variety of reasons. The most cited reason is to reduce IT-related operating costs. Other reasons include improving IT-related service levels, gaining access to higher quality IT-related capabilities, increasing organizational strategic and tactical flexibility, and focusing often scarce internal IT-related capabilities on more strategically important, value-adding activities [10].

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Mining the literature unveiled that, the factors that influence outsourcing success from the perspective of service receiver are partnership quality and service quality of the service provider. Partnership is a long-term relationship and is based on mutual recognition and understanding between the transacting parties. The success in the outsourcing transaction is intrinsically dependent on the other [3]. On the other hand, partnership quality is defined as an inter-organizational relationship to achieve shared goals of the participants. The root of partnership quality is from the social exchange and the relational exchange theories.

Service quality is about the consumers' overall impression of the relative inferiority or superiority of the organization and its services [13]. Service quality is also defined as how well a delivered service level matches customer's expectation. Within the service marketing, the SERVQUAL is considered one of the most cited and adopted models for measuring service quality [1,2]. The model measures service quality by looking into the gap between customer's perceptions and expectations. Many researchers investigating outsourcing practices had adopted the instrument to measure the service quality of the service providers (e.g. see [8,16]).

3. RESEARCH FRAMEWORK

Figure 1 depicts the research framework used in the study. The independent variables are service quality and partnership quality. The dependent variable is outsourcing success. The dimensions of service quality are tangibles, reliability, responsiveness, assurance and empathy. The dimension of partnership quality is benefit risk sharing, business understanding, trust, knowledge sharing, conflict and commitment. The dimensions of outsourcing successes are strategic benefits, economic benefits and technological benefits. The framework is developed mainly from the work of [8, 16, 17].

The study by Hussin et al. in the context of Malaysian organization discovered that service quality is a significant predictor of outsourcing success [8]. However, the study operationalized service quality in three dimensions only, namely responsiveness, tangible and responsibility. Another study by Chakrabarty et al. showed that all the five dimensions of SERVQUAL which are tangibles, reliability, responsiveness, assurance and empathy are significant determinants of outsourcing success [16]. Following Chakrabarty et al., this study operationalizes service quality with five dimensions as shown in Table 1. Accordingly, the following hypothesis is established i.e. H1: Service quality is a significant predictor of outsourcing success.

Table 1: Operational Delimitations for service quality variables

Variable	Operational Definitions
Tangible	Physical facilities, equipment and appearance of IT service provider [1,2]

Variable	Operational Definitions
Reliability	The ability of IT service provider to perform the promised service dependably, accuracy and on time [1,2]
Responsiveness	IT service provider's willingness to help customers and provide prompt service [1,2]
Assurance	Knowledge and courtesy of IT service provider and their ability to inspire trust and confidence [1,2]
Empathy	Caring, individualized attention the IT service provider give their customers [1,2]

Just as service quality, partnership quality has been shown to have strong influence on outsourcing success. The study by Hussin et al. discovered that partnership quality is a strong determinant of outsourcing success [8]. Likewise, a study by Chakrabarty et al. also showed that partnership quality is a strong determinant of outsourcing success [16]. Another study also unveiled similar finding [11]. The dimensions of partnership quality that are mainly used by these researchers are shown in Table II. Based on this background, this study establishes the following hypothesis, i.e. H2: Partnership quality is a significant predictor of outsourcing success.

Table 2: Operational Delimitations for partnership quality variables

Variable	Operational Definition
Benefit risk Sharing	Degree of articulation and agreement on benefit .and risk between partners [6]
Business Understanding	Degree of understanding of behaviors, goals, and policies between service receiver and service provider [11]
Trust	Degree of confidence and willingness between IT outsourcing partners [15]
Knowledge Sharing	The degree of which critical or propriety information is communicated between IT outsourcing service receiver and vendor, which broadly includes tacit and explicit knowledge [11]
Commitment	Degree of incompatibility of activities, resources shared and goals between service receiver and service provider [11]
Conflict	The degree of the pledge of relationship continuity between IT outsourcing service receiver and vendor [9]

When studying outsourcing practices, many researchers had operationalised successes based on the benefits of the outsourcing itself. The most frequently used measurements are strategic, economic and technological. Studies by [8] and [16] had also employed

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these measurements for assessing outsourcing success. The descriptions of these measurements are illustrated in Table III.

Table 3: Operational Delimitations for outsourcing benefits variables

Variable	Operational Definition
Strategic	The ability of a firm to focus on its core business by outsourcing routine IT activities [8,17]
Economic	The ability of a firm to use expertise and economies of scale in human and technological resources of the service provider and to manage its cost structure through unambiguous contractual arrangement [8,17]
Technological	The ability of a firm to gain access to leading edge IT and to avoid the risk of technological obsolescence [8,17]

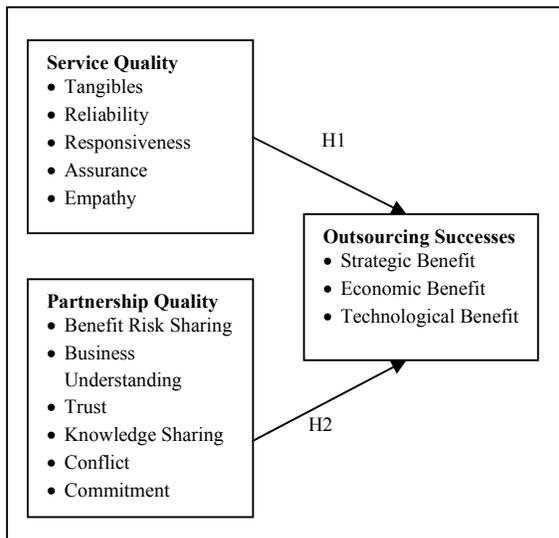


Fig 1: Research framework

4. RESEARCH METHODOLOGY

The study used survey research methodology involving 60 employees working in a multinational company operating in Malaysia. The company has more than 150 employees. Data were collected using a questionnaire. Measurements developed by previous researchers [8,16] were adapted for developing the questionnaire. For each dimension or variable, several items were used and for each item respondent has to respond by indicating their level of agreeableness ranging from 1= "Strongly Disagree" and 7 = "Strongly Agree". Adopting a systematic random sampling technique, questionnaires was distributed to these 100 employees. The respondents were given about one month to respond to the questionnaire. Reminders were given after two weeks for those who had not responded. After the one month period, a total of 60 questionnaires was returned. All of the questionnaires were found to be usable for further analyses. Given the limited number of respondents, factor analysis was omitted. The execution

of reliability analysis showed that the Cronbach Alpha for all variables are well above 0.7, implying that the measurement used is reasonably sound. The result of the reliability analysis is shown in Table IV.

Table 4: Reliability analysis of research variables

Variable	Cronbach Alpha	Overall Cronbach Alpha
Tangible	0.700	Service quality = 0.951
Reliability	0.850	
Responsiveness	0.823	
Assurance	0.795	
Empathy	0.917	
Benefit Risk Sharing	0.904	Partnership quality = 0.963
Business Understanding	0.866	
Trust	0.845	
Knowledge Sharing	0.925	
Commitment	0.859	
Conflict	0.890	Outsourcing success = 0.951
Strategic	0.832	
Economic	0.868	
Technological	0.896	

5. FINDINGS

Table V presents the demographic profile of the respondents. Out of 60 respondents who participated in the study, 30 or 50% of them are male, while the remaining are females (50%). In terms of age, the highest percentage is from age between 30-39 (43.3%), and followed by 40 – 49 (33.3%). The majority of the respondents indicated that their highest academic qualification is either Diploma (36.7%) or Bachelors Degree (36.7%).

Table 5: Demographic profile of respondent

	Variable	Mean	Standard Deviation
Gender	"Male"	30	50.0
	"Female"	30	50.0
Age	"20-29"	13	21.7
	"30-39"	26	43.3
	"40-49"	20	33.3
	"50-59"	1	1.7
Qualification	"Diploma"	22	36.7
	"Bachelor"	22	36.7
	"Master"	9	15.0
	"Others"	7	11.7

The results of the descriptive analysis for service quality dimensions are shown in Table VI. The mean values for all dimensions are well above 5.00 (Note: 1 is the minimum while 7 is the maximum), while the standard deviations are mostly less than 1.00. These values suggest that, generally the employees in the company felt that service quality provided by the service provider companies are excellent and matched to their needs and expectations. Out of the five dimensions, the “tangible” dimension scored the highest meanwhile the lowest is the “empathy” dimension. The corresponding chart for the results of the descriptive analysis for the service quality dimension is shown in Figure 2.

Table 6: Descriptive analysis of service quality variables

Variable	Mean	Standard Deviation
Tangible	5.5944	0.79568
Reliability	5.3000	0.88872
Responsiveness	5.2708	0.88931
Assurance	5.5167	0.79972
Empathy	5.0100	1.02274

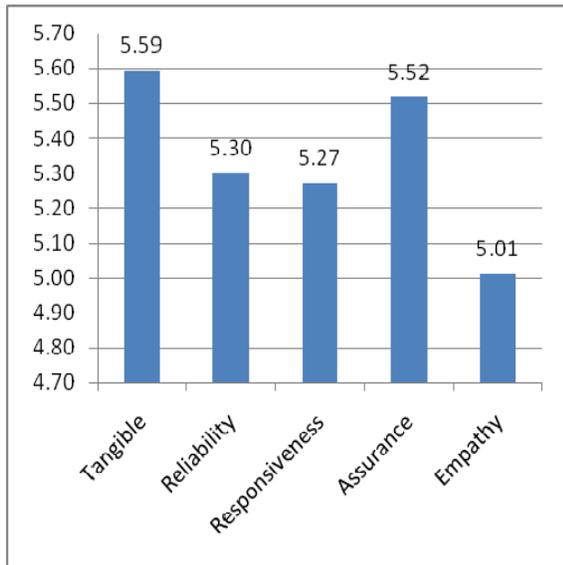


Fig 2: Descriptive results of service quality dimensions

Table VII depicts the results of descriptive analysis for the partnership quality variables. The mean values are well above 5.0 (Note: 1 is the minimum while 7 is the maximum) and ranged between 5.04 and 5.53. The highest mean is for “conflict” while the lowest is “trust”. Except for “business understanding” and “trust”, all other variables scored standard deviation values of around 1.00. Nonetheless, all these values indicate that the employees perceived that the partnership quality between their company and the service provider as very good and strong. The corresponding chart displaying the similar results is shown in Figure 3.

Table 7: Descriptive analysis of partnership quality variables

Variable	Mean	Standard Deviation
Benefit risk Sharing	5.1375	1.01098
Business Understanding	5.3167	0.97410
Trust	5.0458	0.90724
Knowledge Sharing	5.2458	1.01732
Commitment	5.2288	1.03837
Conflict	5.5389	1.06315

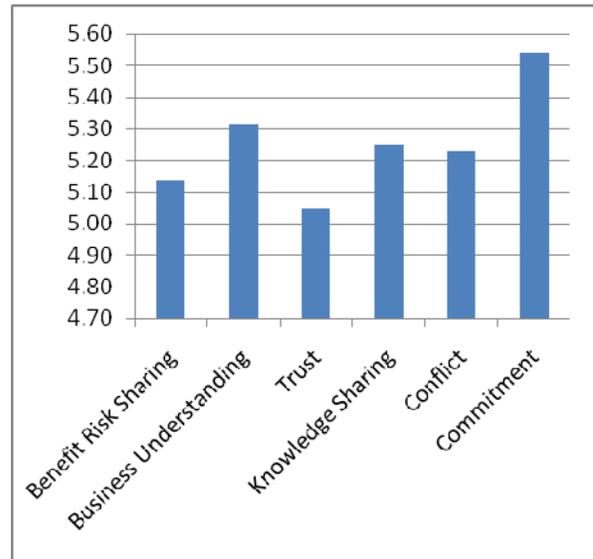


Fig 3: Descriptive results of partnership quality dimensions

Out of the three outsourcing benefits, the “technological” dimension scored the highest mean scoring while “economic” dimension scored the lowest. The mean scores for all three dimensions are around 5.0 (Note: 1 is the minimum while 7 is the maximum) while the standard deviations are all less than 1.0. The results evidently showed that the employees perceived that the outsourcing practices employed by their company are providing great benefits and advantages. The complete results is shown in Table VIII.

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Table 8: Descriptive analysis of outsourcing benefits

Variable	Mean	Standard Deviation
Strategic	5.5542	0.88549
Economic	5.5000	0.93087
Technological	5.7750	0.88502

Table IX, X and XI depict the results analysis of multiple regressions between the independent variables and a dependent variable. The p-value of the regression test is less than 0.5, thus indicating that the test is significant. Further scrutiny on the results showed that the p-values of the t test for both partnership quality and service quality are significant. The results clearly show that both independent variables have influenced on outsourcing success.

Table 9: Model summary of regression analysis

R	R Square	Adjusted R Square	Standard Error of the Estimate
0.761	0.580	0.565	0.570

Table 10: Anova of regression analysis

	Sum of Squares	df	Mean Square	F	Sig.
Regression	25.129	2	12.564	36.619	0.000
Residual	18.219	56	0.325		
Total	43.348	58			

Table 11: Coefficients of regression analysis

	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Standard Error	Beta		
Constant	1.706	0.541		3.154	0.003
Partnership Quality	0.844	0.140	0.827	6.048	0.000
Service Quality	-0.100	0.157	0.087	-0.637	0.500

6. DISCUSSION AND CONCLUSION

The main objective of this study was to investigate outsourcing success and its contributing factors from the user perspectives. The results have shown that users generally agreed that outsourcing as practiced by their organization to bring great benefits. They perceived that the greatest benefit is in the form of technological transfer. Service quality and partnership quality have been examined to identify whether they contribute towards outsourcing success. Apparently, the results indicate that both variables are strong predictor. This study provides empirical evidence from the user

perspective on the importance of partnership quality and service quality in ensuring outsourcing success.

REFERENCES

- [1] A. Parasuraman, V.A. Zeithaml, and L.L. Berry, "A conceptual model of service quality and its implications for future research," *Journal of Marketing*, 49(4), pp. 41-50, 1985.
- [2] A. Parasuraman, V.A. Zeithaml, and L.L. Berry, "SERVQUAL: A multiple-item scale for measuring consumer perceptions of service quality," *Journal of Retailing*, 64(1), pp. 12-40, 1988.
- [3] B. Kim and K. Park, "Satisfying different customer groups for IS outsourcing: a Korean IS company experience," *Asian Pacific Journal of Marketing and Logistics*, vol. 15(3), pp. 48-69, 2003.
- [4] C. Hern, and R.J. Burke, "Enhancing the success of outsourcing initiatives," *Europe's Journal of Psychology*, vol. 2(4), 2006.
- [5] C.H. Yeh, "A Research Framework of Information Systems Outsourcing," 1996.
- [6] F. McFarlan and N.L. Nolan, "How to manage an IT outsourcing alliance," *Sloan Management Review*, 36, pp. 9-22, 1995.
- [7] G. Mesnita and F. Dumitriu, "Trends of Information Systems Outsourcing. A Romanian Perspective," *Social Science Research Network*, pp. 1- 28, 2005.
- [8] H. Hussin., Z. Ismail, M.A. Suhaimi and N.S.A. Karim, "Examining Factors Influencing Outsourcing Success in Malaysian Organizations", *Proceedings of the 17th Australasian Conference on Information Systems*, 6-8th December, Adelaide, Australia.
- [9] J. Mohr and R. Spekman, "Characteristics of partnership success: partnership attributes, communication behavior, and conflict resolution techniques," *Strategic Management Journal*, 15, pp. 135-152, 1994.
- [10] J.H. Lim, V.J. Richardson, R.W. Zmud, "Value Implications of IT Outsourcing Contextual Characteristics," 2007.
- [11] J.N. Lee and Y.G. Kim, "Understanding Outsourcing Partnership: A Comparison of Three Theoretical Perspectives," *IEEE Transactions on Engineering Management*, 52(1), pp. 43-58, 1995.
- [12] K. Sengupta, and M. Zviran, "Measuring User Satisfaction in an Outsourcing Environment," *IEEE*, vol. 44(4), pp. 414-421, 1997.

<http://www.cisjournal.org>

- [13] M. Bitner, "Evaluating Service Encounters: The Effects of Physical Surroundings and Employee Responses," *Journal of Marketing*, vol. 54, pp. 69-82, 1990.
- [14] N.H. Arshad, Y.M. Lin, A. Mohamed, and A.B. Udin, "Service Delivery In ICT Outsourcing: Relationship Intensity Between Vendor And Client," *Public Sector ICT Management Review*, 2(2), pp. 15-21, 2008.
- [15] R. Sabherwahl, "The role of trust in IS outsourcing development projects," *Communications of ACM*, 2(2), pp. 80-86, 1999.
- [16] S. Chakrabarty, D. Whitten, and K.W. Green, "Understanding Service Quality and Partnership quality in IS Outsourcing: Client Orientation & Promotion, Project Management Effectiveness, and the Task-Technology-Structure Fit," *Journal of Computer Information Systems*, 48(2), pp. 1-15, 2008.
- [17] V. Grover, M.J. Cheon, and James T.C.T., "The effect of service quality and partnership on the outsourcing of information systems functions," *Journal of Management Information Systems*, vol. 12(4) pp. 89-116, 1996.