
Information technology outsourcing in Australia: a literature review

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Abstract

The objective of this literature review is to provide a background and a synthesis of existing studies conducted on IT outsourcing. The IT outsourcing trend has become increasingly popular and heavily documented and studied in Europe and the USA. It is therefore appropriate and timely to consider the value and incidence of IT outsourcing in Australian organisations. The literature review deals with the impetus for outsourcing and factors contributing to its success. It covers two useful theoretical frameworks, transactional cost theory, and resource-based theory that facilitate research into outsourcing.

Purpose of literature review

To date hardly any extensive studies have been conducted assessing the extent of information technology (IT) outsourcing in Australia. It is certain that the use of IT outsourcing is increasing in Australia, as exemplified by outsourcing decisions made by the following entities: Australian Federal Government (Beer, 1999), AMP Insurance (McFarlan and Nolan, 1995), Ansett Australia, Mercantile Mutual (Howarth, 1999) and the Commonwealth Bank of Australia (King, 1998). It is appropriate to determine whether outsourcing yields benefits or is merely another managerial "fad".

Background

Businesses have been using IT outsourcing since the early 1960s (Due, 1992; Lacity, 1992). In 1963, Perot's electronic data systems (EDS) was performing data processing services for Frito-Lay and Blue Cross (Mason, 1990). Current IT outsourcing has changed significantly since these earlier arrangements. The differences relate to the operational, technical, and financial sophistication of outsourcing vendors and the flexibility of their offerings (Radding, 1993). Such variances have contributed to the IT outsourcing business gaining popularity, as evidenced by increasing press coverage. It is considered a "growing phenomenon in developed economies" (Willcocks *et al.*, 1995, p. 59). Other reasons for its popularity include: it represents a shift in the business strategy (that is, the refocussing on core competences); and uncertainty about the value of IT (IT may be perceived as a cost burden) (Lacity *et al.*, 1996).

The growth of outsourcing is mainly attributed to its supposed benefits. Organisations are attracted by outsourcing vendors that offer to cut costs by 10 per cent to 50 per cent (Lacity and Hirschheim, 1993a, p. 74). However, some experts suspect that these numbers may represent short-term savings or budget manipulations (Lacity and Hirschheim, 1993b). Outsourcers also claim they can supply expertise, provide clients with state-of-the-art technology (Benko, 1993), eliminate problems associated with technological obsolescence (Gupta and Gupta, 1992), and increase the flexibility and quality of IT services (Antonucci *et al.*, 1998). Outsourcing vendors generally promise to manage the functions that cannot add value internally, freeing up management time to focus on central strategic business issues (Caldwell and McGee, 1998).

It is important to ascertain the forces behind Australian organisations' increasing use of IT outsourcing by considering the following questions:

- What are the forces that encourage Australian organisations to use IT outsourcing?
- What is the extent of IT outsourcing in Australia?
- What are organisations' reservations or reasons for not outsourcing IT?
- What are the factors that contribute to successful arrangements?

Driving forces

Various perspectives are offered that help capture the scope and complexity of the decision process associated with outsourcing IT. When outsourcing is undertaken for the right reasons, it may prove to be a feasible, economic, and highly productive approach. However, outsourcing may not be



appropriate for every organisation. If adopted for the wrong reasons, an organisation may suffer major technological and economic setbacks (Gupta and Gupta, 1992). The most commonly cited reason for undertaking outsourcing is cost reduction (Lacity and Willcocks, 1998; Loh and Venkatraman, 1992a; McFarlan and Nolan, 1995; Willcocks *et al.*, 1995). Despite this, cost is not the rationale behind all IT outsourcing decisions. The driving forces for IT outsourcing can be broadly categorised as:

- 1 cost reduction;
- 2 technical considerations; and
- 3 the need to focus on core activities.

These three broad categories do not capture the complexity of the rationale for outsourcing. Loh and Venkatraman's (1992b) study, based on a bibliographic search, offers an alternative analysis of the impetus for outsourcing based on administrative innovation theory. Administrative innovation is defined as:

involving significant changes in the routines used by an organisation to deal with its tasks of internal arrangements and external alignment (Loh and Venkatraman, 1992b, p. 337).

Diffusion has been suggested as a mechanism whereby an idea, such as outsourcing, spreads amongst organisations. The two main competing theories of diffusion considered were the internal and external mechanisms. The internal component is defined as:

the rate of increase in the number of adoption depends on the extent in which the members of the community have already adopted the innovation (Loh and Venkatraman, 1992b, p. 340).

That is, companies make outsourcing decisions based on other organisations that have already outsourced. Conversely, external factors are relevant when the "diffusion is driven only by information from a communication source external to the social system" (Loh and Venkatraman, 1992b, p. 340). That is, potential organisations that adopt IT outsourcing do so due to the efforts made by vendors, consulting firms or trade periodicals.

The Eastman Kodak decision is regarded as a turning point in outsourcing's history. Adoption was considered, in Loh and Venkatraman's (1992b) study, before and after Eastman Kodak's decision to outsource. The main findings of Loh and Venkatraman's (1992b) study were that adoption of IT outsourcing is motivated more by internal forces and imitative behaviour, than by external influence amongst user

organisations. Internal influences became more dominant after Eastman Kodak's outsourcing decision compared with the "pre-Kodak regime". Their findings raise questions about other driving forces that may influence the decision to outsource IT without explicitly addressing them.

In the context of diffusion and imitation, Lacity and Hirschheim (1993a, c) have described this type of imitative behaviour as the "bandwagon effect". They argue that outsourcing is often a response to the hype and publicity surrounding the subject, which leads senior management to ask "Why don't we outsource IT/IS?" (Lacity and Hirschheim, 1993a, p. 74). Lacity and Willcock's (1998) study reinforces the finding that this way of thinking is real; they found that 38 per cent of respondents cited "jump on the bandwagon" as a reason for outsourcing IT. The Loh and Venkatraman (1992b) study provide stronger explanations for the "Kodak Effect" by using administrative innovation theory.

Loh and Venkatraman's (1992b) study is useful as it contributes to the existing body of knowledge that tries to explain the increasing popularity of outsourcing. However the study has some methodological limitations. For instance, in regards to contract size, the sample excluded smaller outsourcing decisions as they were not found in the search of the media. This may mean that results and generalisations can only be made to larger organisations. Another problem with the bibliographic search is that contracts prior to 1988 may not have been reported in the media.

As outsourcing, as an innovation, has reached a more advanced diffusion stage (Teng *et al.*, 1995), the applicability of administrative innovation theory in today's outsourcing environment is open to question. Despite its dubious applicability, it certainly provides an insight to human behaviour. Such intangible aspects of human behaviour are usually ignored in most of the literature that examines the impetus for outsourcing. Further research may consider the conceptual element of extending the administrative innovation theory to ask "Why do organisations imitate behaviour?". Some possible answers may include: generation of cost savings that other organisations have achieved, and also that acceptance by other organisations adds credibility to outsourcing. Alternatively, future research may also consider an integrative approach. We now turn our attention to the broad classifications behind the impetus for outsourcing.

Cost reduction

Williamson's (1975) transaction cost theory (TCT) provides a useful starting point for research, investigation and discussion of the IT outsourcing phenomenon. There is a plethora of empirical and theoretical support for Williamson's model (Bowen and Jones, 1986; Griesinger, 1990; Hennart, 1991a, b; Hesterly *et al.*, 1990; Pisano, 1990; Robbins, 1987). In her earlier work, Lacity (1992, p. 49) states that TCT:

is assumed to be a social construct of reality and is not presumed to capture objective, deterministic facts about human motives and behaviour (instead it provides a useful interpretation) for viewing human decision-making.

At the same time it has been criticised and its limitations pointed out (Willcocks and Lacity, 1998).

Theories and studies based on an economic perspective

Williamson's (1975) TCT of the firm is commonly used to analyse organisational decisions on outsourcing and interpret outsourcing decisions. TCT has been used: to explain why organisations exist – that is, why economic activity is carried out in organisations rather than solely in markets (Amundson, 1998, p. 348).

TCT assumes that companies make outsourcing decisions based on an economic rationale. TCT is obviously relevant as IT specifically addresses outsourcing decisions in regards to producing a good or service internally or externally (Lacity and Hirschheim, 1993a). IT outsourcing can be framed as a "make-versus-buy" decision facing a firm. This may be critiqued for representing a narrow view of a complex process.

Williamson (1975) proposes that managers need to consider both production and transaction co-ordination costs, for example, "the costs of monitoring, controlling, and managing transactions" (Lacity and Hirschheim, 1993a, p. 25) when making decisions about outsourcing. The primary theoretical construct of TCT is cost efficiency and, since costs are sometimes difficult to assess, Williamson proposes three other constructs that clarify the underlying cost structure. These are: transaction type; the threat of opportunism; and uncertainty (Williamson, 1975).

In determining co-ordination costs, Williamson hypothesises that outsourcing results in higher co-ordination costs because

organisations have to monitor the vendor's behaviour. The co-ordination construct raises the following issues:

- whether the service is the best possible;
- whether the price is reasonable; and
- whether vendors treat client data confidentially.

The concept of the IT stewardship team is introduced, it is the responsibility of the IT steward to manage such issues. Such issues are further illuminated by the construct, "Threat of Opportunism", where costs may increase if the vendor behaves opportunistically (Davis and Devinney, 1997). This construct suggests that human nature is assumed to take on negative characteristics, where people will take advantage of other parties with whom they are transacting business, knowing and understanding their self-interested behaviour (Amundson, 1998). This negative view of human behaviour imposes limitations of the theory's applicability to the emerging shift towards partnering between vendors and clients.

Issues relating to the construct Threat of Opportunism may also arise as outsourcing vendors take control of the IT function; some fear vendors may take advantage of clients. Others fear vendors may not maintain confidentiality (Nam *et al.*, 1996). However, if a client is dealing with a reputable firm, concerns over confidentiality are handled by a confidentiality clause. Another concern is that the outsourcing vendor may take advantage of the contract by charging excessive fees for services the client assumes the contract covers.

Williamson postulates that co-ordination costs can be reduced by paying attention to contract details. This argument is reiterated extensively in the literature (Auer, 1993; Cuthbertson, 1995; Halvey and Melby, 1996; McFarlan and Nolan, 1995; Schachtman, 1998; Wildish, 1993) that focuses on the importance of developing clear contracts and managing outsourcing arrangements. Thus indicating that tight contracts may contribute to the success of an arrangement.

TCT logic and conclusions rest on the assumption that efficiency is the dominant criterion for organisational success (Amundson, 1998). Ghoshal and Moran (1996) argue other dimensions of competitiveness may be more important for the long-run performance and health of the firm. Some suggested dimensions include:

- learning;
- innovation; and
- new product introduction.

When considering the production costs of "capital, labor, and materials ... Williamson

suggests that outsourcers often achieve economies of scale that elude smaller, internal IS shops” (Lacity and Hirschheim, 1993a, p. 47). Williamson argues that vendors have a production cost advantage only when products and services are standard, and that in-house production costs may be lower when there is a high degree of customisation. This makes the outsourcing decision more complex, as decision-makers must determine which functions are standard or require high customisation.

Loh and Venkatraman’s (1992a) research on IT outsourcing is written from the perspective of the US business and IT contexts. They test a model of economic determinants of IT outsourcing. The authors gathered survey data from 55 large US industrial and service corporations. Factor analysis and multiple regression found empirical confirmation of three of five hypotheses. They found that the extent of IT outsourcing is positively related to both the firm’s business and IT cost structures. They also found that internal IT performance is negatively related to outsourcing and the “key compelling force driving companies to outsource is cost savings” (Loh and Venkatraman, 1992b, p. 19). This is consistent with Williamson’s TCT, which emphasises the importance of rationalising costs in an attempt to stay competitive in the market.

Loh and Venkatraman (1992a, p. 20) describe their study as having a “firm-level focus using a neoclassical economic perspective”. They seem dissatisfied with the restrictive scope of their model and identify three avenues for further, more comprehensive investigation. They propose:

- 1 an organisational economic model building on work influenced by Williamson’s transaction cost theory;
- 2 a diffusion process model investigating imitative behaviour; and
- 3 an organisational process model of IT outsourcing.

Loh and Venkatraman (1992b) investigated diffusion models as a mechanism explaining the spread of outsourcing amongst organisations.

Loh and Venkatraman (1992a) also refer to the theory of economies of scale as an explanation of outsourcing. Outsourcers obtain economies of scale by doing the same work for many clients, for example, payroll processing. This theory postulates that large companies can achieve lower average costs than small companies due to mass production and labour specialisation efficiencies (Baron, 1992). Writers (Lacity and Hirschheim 1993b; Loh and Venkatraman,

1992a) who support this theory argue that executives viewing IS as utilities would find that large vendors can provide such utilities less expensively through mass production and specialised labour. Their client’s management, freed of the need to manage a possibly unfamiliar technology, can focus on its company’s core competencies. Hence “organisations whose primary business is information processing achieve greater economies of scale [in IT] at a faster pace” (Gupta and Gupta, 1992, p. 46) compared with firms in which information processing is only a support function. Outsourcing vendors serve multiple users simultaneously, implying that their knowledge, skills, and capacity can be pooled across different customers (Loh and Venkatraman, 1992a). Suppose that a vendor has 50 clients for which they provide outsourcing services. The vendor and client both benefit from economies of scale since the costs of developing, running, and maintaining the systems are distributed over 50 clients.

Some writers challenge the applicability of the economies of scale model. Antonucci *et al.* (1998) argue that this model may not always apply in outsourcing. They observe that: small companies may [obtain] lower costs than large companies by employing older technology, offering below-market wages and maintaining tight controls and procedures (Antonucci *et al.*, 1998, p. 30).

Cost savings that may be achieved by vendors may also be produced internally:

Fairly large data centres should be able to achieve many of the economies of scale enjoyed by vendors. . . the advantage of in-house data centres is that they do not have to make a profit as vendors do (Lacity and Hirschheim, 1993b, p. 24).

Hence, arguing that the traditional rationale of vendor economies of scale and specialisation is becoming a less convincing argument for outsourcing (Di Romualdo and Gurbaxani, 1998). This suggests that other variables may be more persuasive than a simple economic rationale. The relevance of economies of scale theory may vary with applications, industries and organisations.

Support for cost reduction as a major impetus to outsource is identified in case studies by Lacity and Willcocks (1998). This study primarily sought to identify the five best IT outsourcing practices. The study built on a previous collection of data on 61 IT sourcing decisions made in 40 US and UK organisations during 1991 and 1995. The study identified the three main reasons for and expectations from outsourcing arrangements as, “reduce IT costs” (80 per cent of respondents), “improve technology or

technical service” (59 per cent) and “jump on the bandwagon: outsourcing perceived an irreversible trend in their industry (38 per cent)” (Lacity and Willcocks, 1998, p. 369). Furthermore, the study found that 71 per cent of outsourcing decisions were perceived as successful, where success was measured in terms of realising cost expectations. The study failed to consider alternative ways of measuring success. Other limitations of this research include “the [non-random] selection of cases, interview method, and data analysis” (Lacity and Willcocks, 1998, p. 384). This research was based on a convenience sample, not a random sample and the study’s results may not be generalisable.

Collins and Millen (1995) found that cost savings resulting from a reduction of personnel were the main reason for outsourcing. A sample of 110 chief information officers (or equivalent) of the 500 largest industrial firms in the USA was used. The study sought to provide information about outsourcing in general. It covered areas such as planning and implementation issues, benefits achieved, and impact on performance. The nature of this study was inductive. Inductive reasoning is “the logical process of establishing a general proposition on the basis of observation of particular facts” (Zikmund, 1997, p. 28) and hypotheses are not generated a priori. It is questionable whether the study can be critiqued for not having set out hypotheses since the study has an inductive approach. Studies that are deductive, where hypotheses are generated prior to beginning the study, may allow for better construction of surveys. Nonetheless the study lacks rigorous statistical analysis.

Personnel cost savings are generated by saving salaries and on costs. Collins and Millen (1995) cited other reasons for deciding to outsource as follows:

focus in-house IS on core functions, improve quality of IS services, and increase flexibility’(Collins and Millen, 1995, p. 8).

Technical considerations relevant to outsourcing decisions

In some circumstances, technical considerations such as lack of resources, skills or time may lead an organisation to consider entering an outsourcing arrangement instead of developing or maintaining systems in-house (Gupta and Gupta, 1992). The rapidly changing pace of IT also places immense strain on an internal IT department trying to keep up with such changes. This may not be possible for some organisations, especially smaller organisations. The high cost and managerial

distraction involved in the development of in-house systems may detract from implementation of the organisation’s strategic vision. Other important considerations include the type of function being considered for outsourcing. Common business applications (e.g. payroll) are routinely outsourced but management may be reluctant to some systems that are thought to give the organisation a competitive advantage.

Technical considerations are captured by resource-based theories and resource dependence theories. Such theories primarily derived from the strategic management stream. They exemplify how firms formulate and implement strategies, how this links to the resources of the firm and the effect this has on accomplishing goals (Barney, 1991). Resource-based theories are more concerned with the internal analysis of a firm in terms of resources and capabilities. Resource-dependence theories focus on the external environment of the firm (Teng *et al.*, 1995). Such theories provide an explanation of firm performance that competes with other explanations such as TCT (Amundson, 1998).

Resource-based theories state that firms possess bundles of resources that assist the firm in gaining competitive advantage (Barney, 1991). Firms’ resources are strengths that firms can use to devise and implement their strategies. The resources include:

- financial;
- physical;
- human; and
- organisational (Barney, 1995).

Outsourcing enables the acquisition of resources that may be necessary to develop new capabilities in order to fill gaps of resources (Grant, 1991). This notion of filling gaps is highly applicable to the complex world of IT. Resource dependence theory centres around firms that enter into exchange relationships with other firms in the external environment. This is likely to occur when the firm is unable economically to generate necessary resources or capabilities internally (Teng *et al.*, 1995).

The use of outsourcing as a strategy to fill gaps is captured in a recent Help Desk Institute survey: 58 per cent of 1,007 respondents say they outsourced some or all of their help desk operations in 1994, up from 12 per cent in 1993 (Radding, 1995), with varied motivations. The author of the Help Desk Institute survey postulates that cost is not driving outsourcing, an increase in workload is a more compelling reason to outsource (Radding, 1995). This demonstrates

that driving forces for IT outsourcing differ depending on the function being outsourced and the organisation's strategy.

Another consideration is that some firms do not have the skills or the time to develop them. This can be linked to cost – because immense costs may be encountered in developing IT and attracting people with skills. The difficulties in attracting staff are the shortage of people with IT skills and that “knowledge” people may prefer to work in organisations, such as vendors, that have a high technology culture. It can also be linked to the strategy of client organisations – that is, the organisation's goal, purpose, and vision may not be in the area of developing IT, even though they need IT to perform functions and enable the business.

This is reinforced by McFarlan and Nolan (1995), who point out that outsourcing offers a way for some organisations to gain relevant skills without getting “involved in the complex management issues they are not skilled in and did not want to manage” (McFarlan and Nolan, 1995, p. 14). This situation is more likely to apply to companies that have a low technology culture and would encounter difficulty in attracting and retaining highly skilled technology IT staff. A company cannot control what it does not understand. Outsourcing also provides companies with the opportunity to gain access to specialised knowledge and expertise without the risks associated with building the specialisation in-house. Organisations may minimise losses incurred if a certain technology fails to deliver on its investment. Also rapid technological advances are not of concern to clients as outsourcing vendors assume the burden of remaining abreast of the technology (Gupta and Gupta, 1992).

Focus on core activities

The CIO of a multinational oil corporation described outsourcing as:

a method of rebuilding the focus of the organisation so that you focus on what is important to the organisation, and not what is important to the traditional IT world (Willcocks and Lacity, 1998, p. 1).

This argument is frequently cited in the literature (Benson and Ieronimo, 1996; Lacity *et al.*, 1996; McFarlan and Nolan, 1995; Pralahad and Hamel, 1990; Willcocks *et al.*, 1995). It is thought that organisations should focus on their core competences and activities, while contracting out peripheral activities that the market can perform more cost-effectively and/or which distract an

organisation from its core activities. Hence outsourcing is viewed as a strategic decision that may result in far-reaching and extensive effects on the entire organisation.

This section deals with two inter-related issues:

- 1 the argument that non-core activities should be outsourced;
- 2 that organisations outsource certain IT functions to gain greater focus on their core functions.

The decision is not as simple as the strategic-versus-commodity approach would suggest. Lacity *et al.*'s (1995) study identified the following important findings. First, although a particular IT function may be viewed as a commodity, it may be too critical to hand over to an outsider. Similarly, an IT activity that is seen as business critical or strategic does not necessarily mean that all its elements had to be kept in-house. For example, just because a function is strategic, may not necessarily mean that the IT systems supporting that function are also strategic. Hence even though IT is viewed as strategic does not necessarily translate into the belief that they ought to retain ownership and control of the production process for IS (Gurbaxani, 1996). The highly publicised Kodak outsourcing contract is an example of an organisation outsourcing for strategic advantage (Gupta and Gupta, 1992).

This argument may also be linked resource based theories. For example, firms may lack the talent and skills to develop potential core differentiating applications. Under such circumstances, researchers have suggested it is advisable to outsource core functions (Saunders *et al.*, 1997).

The study conducted by Willcocks *et al.* (1995) draws on a detailed analysis of 30 case histories and the success achieved with different IT sourcing decisions in various sets of circumstances. The researchers conducted interviews and collected company documentation on a sample of medium and large European manufacturing and service companies, privately and publicly owned.

This study identifies six critical factors used to model IT outsourcing decisions and provides a framework for decision making based on findings from the sample. The study may be criticised for not using a sample that is large enough or adequately representative to develop such a framework. Nonetheless, the study offers an acceptable framework that provides a starting point for further examination. The main findings are that it is best to outsource non-core activities, that is activities that do not act as strategic differentiators. The researchers also argue

for organisations to undertake targeted, not total, outsourcing as a way of minimising risk. There is perhaps a degree of researcher bias as UK outsourcing, in comparison to US outsourcing, tends to promote selective outsourcing over total outsourcing (Pinnington and Woolcock, 1995).

The Australian Federal Government has recently committed itself to a total IT outsourcing arrangement. Willcocks, on a recent visit to Australia, stated that the Australian Federal Government's approach to IT outsourcing is bound to fail, because it is high risk and does not distinguish between core and non-core IT functions (Beer, 1999). This statement is consistent with Willcocks' views on selective outsourcing and the importance of ensuring that core activities are maintained in-house.

Lacity *et al.* (1996) set out to determine why IT outsourcing frequently fails to produce the expected cost savings or other benefits. The researchers examined 62 sourcing decisions at 40 organisations. The companies studied represent a variety of industries, venues, sizes, sourcing decisions, and financial outcomes. The authors attribute the main reason for failure due to managers not putting enough careful consideration into the decision of which IT activities to outsource. Based on their findings, the researchers recommend selective outsourcing over total outsourcing. Total outsourcing occurs when 80 per cent or more of the organisation's IT budget is spent on outsourcing. Selective outsourcing is when outsourcing expenditure is less than 80 per cent (Pinnington and Woolcock, 1995).

The authors also developed a set of frameworks "to clarify options and aid managers in deciding which IT function to contract out and which to retain in-house" (Lacity *et al.*, 1996, p. 13). The researchers proposed the framework shown in Table I to help organisations determine which IT activities to outsource.

The development of such a framework suggests that organisations should treat IT as a portfolio of applications that helps to identify an IT activity's contribution to competitive strategy and business operations (Lacity *et al.*, 1996). Skinner and Bond (1997) support this argument by stating:

if the (IT) function is not seen as "core" to adding value but only is seen as a

cost-reduction mechanism or a support service, then it should be considered as a prime candidate for outsourcing (Skinner and Bond, 1997, p. 42).

They go on to say that since management has the responsibility of maximising shareholder value "outsourcing non-core functions has become an important business tool" (Skinner and Bond, 1997, p. 42).

Di Romualdo and Gurbaxani's (1998, p. 68) study suggested that "motivations for outsourcing are evolving from a primary focus on cost reduction to an emerging emphasis on improving business performance". The authors discuss three strategic intents for IT outsourcing and use this framework as a method for assessing outsourcing. The strategic intents include:

- 1 IS improvement;
- 2 commercial exploitation; and
- 3 business impact.

The article contributes to the existing descriptive body of knowledge on the area but fails to provide rigorous empirical evidence. In comparison, the framework developed by Lacity *et al.* (1996) tends to have stronger support for the framework as it is based on empirical case studies.

Pinnington and Woolcock (1995) reported on qualitative results from 12 interviews conducted with senior persons chiefly responsible for IS in 'Top 150' UK companies across industry sectors. This inductive study found that the drivers for IT outsourcing were "cost control and reduction, focusing on core competencies, access to new expertise and technologies, and improved flexibility" (Pinnington and Woolcock, 1995, p. 357). This finding is consistent with other literature (Lacity *et al.*, 1996) that sees outsourcing areas as not being "core competencies of the business nor sources of competitive advantage" (Pinnington and Woolcock, 1995, p. 357).

Success factors germane to outsourcing

"Success is an evaluative concept" (Jaskolka *et al.*, 1985). In the context of outsourcing, it is defined by the extent to which certain goals and benefits have been attained (Grover *et al.*, 1996). Hence the success of an outsourcing

Table I
Selecting IT outsourcing candidates

Contribution of IT activity to business operations	Commodity	Differentiator
Critical	Best source	Insource
Useful	Outsource	Eliminate or migrate

arrangement may be contingent on myriad factors relating to reasons for outsourcing (i.e. firms expectations). Presenting the predicament that motives for outsourcing cannot always be determined by referring to a unique quantifiable or objective criterion. To overcome this predicament (not being able to measure success precisely) success can be viewed as the feeling that the right decision has been made (Van der Zee, 1997).

Relatively few studies have provided in-depth examination of success factors in outsourcing arrangements. The literature contains numerous anecdotal suggestions for outsourcing success. These suggestions cover a broad spectrum of areas and include:

- quality of services provided by the vendor (McFarlan and Nolan, 1995);
- dealing with HR issues (Khosrowpour *et al.*, 1996);
- selecting right functions for outsourcing;
- selecting service providers and increasing flexibility and control (Lacity *et al.*, 1995); and
- accountability of clients (Grover and Teng, 1993).

Grover *et al.*'s (1996) study offers new insights into factors that contribute to success within the outsourcing relationship. They identified that the service quality of the vendor and elements of partnership such as trust, co-operation and communication, may affect success. Specifically, they found a high correlation between partnership and outsourcing success. In addition, they found that "success is found to be highly related to the degree of outsourcing of two functions, systems operations and telecommunications" (Grover *et al.*, 1996, p. 90). This study failed to take into account contractual details of the contract.

Other researchers (Lacity and Hirschheim, 1993a; Saunders *et al.*, 1997) explored the relationship between the "tightness" of contracts and the success of outsourcing arrangements. A tight contract is one that defines all aspects of the outsourcing arrangement. It was concluded that companies with loose contracts viewed their outsourcing arrangement as a failure. Presumably tight contracts were an important ingredient for outsourcing success. However Saunders *et al.* (1997) recommend that organisations need to look beyond simple recipes such as tightly written contracts or outsourcing only commodity functions. In doing so they introduce the notion of partnering discovering that partnership arrangements are more likely to be successful than supplier relationships. The notion of partnering in traditionally

client-vendor relationships introduces a new set of obstacles as the concept generally falls outside the contractual framework (Hughes, 1999). Existing literature fails to examine rigorously such issues pertaining to partnering.

Successful outsourcing arrangements are more likely when an organisation has strategically, through appropriate evaluation processes, determined that outsourcing is an effective tool (Benko, 1993; Lacity *et al.*, 1996; Willcocks *et al.*, 1995). Lacity and Hirschheim (1993b) state that a real concern is organisations that naïvely "jump on the outsourcing bandwagon" in an attempt to duplicate cost savings. Such organisations may not have put enough strategic thought or adequately evaluated the feasibility of outsourcing before committing themselves to an agreement. This may lead to dissatisfaction with an outsourcing arrangement, especially when anticipated benefits are not realised.

It is important to determine factors that contribute to successful outsourcing arrangements as this can give some insight into the strategic effectiveness of IT outsourcing as a business tool in today's competitive environment. Collins and Millen (1995) found that 90 per cent of the companies surveyed viewed their IS outsourcing arrangement as successful. Most respondents indicated that the anticipated benefits had been partially or completely achieved. Lacity and Willcocks' (1998) study support this conclusion – that the majority of organisations that have entered IT outsourcing arrangements are satisfied. This study used the realisation of cost benefits as the measure for success. Future research may look at other measures of success. Future research may also compare organisations that outsource and those that do not. This comparison may be based on a comparison of performance factors, such as profitability or sales, of organisations that outsource and those that do not.

Conclusion

The aim of this study is twofold. First, to identify the factors that persuade Australian companies to outsource all or part of their IT function. The main reasons identified in the literature include:

- economic and technical considerations such as the lack of relevant resources;
- strategic focus that is, the need for organisations to focus on their core functions.

An alternative analysis of the impetus for outsourcing was based on administrative innovation theory. However, its applicability in today's outsourcing environment is open to question. The second aim of the study sought to gain a better understanding of factors that contribute to the success of an arrangement.

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