### The Architect's Role in Business-IT Alignment

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#### ABSTRACT

The importance of alignment between business and information technology (IT) for generating IT business value has been emphasized in many research papers. Current literature broadly supports that capable and sustainable enterprise architecture is essential to support business processes as well as future agility. In that respect, individuals performing the role of an enterprise architect are at the core of the interface between business and IT and their relationship with the business side is crucial to generate IT business value. Employing a qualitative study, the authors show that competencies such as profound work experience and business-related topics serves to bridge the IT-business gap and may foster alignment. This result contributes to alignment and governance literature as it emphasizes an individual level antecedent of business-IT alignment.

#### KEYWORDS

Business-IT Alignment, Chief Information Officers, Enterprise Architecture, Information Technology, Qualitative Data Analysis

#### **1. INTRODUCTION**

No other topic has been as consistent at the top of the list of chief information officers' (CIOs) concerns as business-IT alignment (Kappelman, McLean, Luftman, & Johnson, 2013). Indeed, this has been the case for the last 20 years and the issue continues to be relevant. This fact alone justifies the need for researchers and practitioners alike to continue exploring the issue, learning about it, and finding applicable solutions. The relevance of the topic business-IT alignment is directly related to the importance that technology has assumed in contemporary companies. In the last 30 years, nearly all businesses have integrated information technology (IT) into their processes – use of computerized interfaces, networking systems and computer-assisted machinery, to name but a few examples. Today, nearly all companies depend heavily on IT; and nearly all employees deal with IT on a daily basis – its use has become matter of fact. However, it is not a matter of fact that IT is used to its full potential; nor that it contributes to positive development of the business strategy; nor that it is well accepted by

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its end-users. IT in itself does not automatically create business value; people create value by using IT. And this is the point where business-IT alignment becomes an issue.

Business-IT alignment, in general terms, can be viewed as a partnership, where both sides learn constantly from each other, understand and support each other, evolve together and work together towards the same goals. These relationships span the strategic level between CIO and CEO as well as the operational level between line managers and employees on both the business and IT sides.

Since this scenario is far from reality in many companies, CIOs keep pointing out business-IT alignment as their top concern, year after year and a vast body of research about alignment evolved.

Today, most researchers agree that there is no silver bullet to achieving business-IT alignment (Chan 2002, Chan and Reich 2007, Wagner, & Weitzel, 2012). Achieving alignment is rather a continuous process and there are many contributing dimensions to the issue (Luftman, 2003).

Among those is earlier IT literature that underlined the importance of formal organizational structure and IT decision-making rights in achieving alignment (Weill, Subramani, & Broadbent, 2002). Recently, there is a growing group of researchers that have recognized the importance of informal structures as a crucial component contributing to alignment (Reich & Benbasat, 1996; Weill, Subramani, & Broadbent, 2002). They argue that the "informal structure can dramatically influence an organization's performance, and can also be strategically utilized" (Chan, 2002).

Researchers over the past three decades have also intensively focused on the topic of IT governance (De Haes & Van Grembergen, 2009; Peterson, O'Callaghan, & Ribbers, 2003), which is intertwined with business-IT alignment (Luftman, 2003). Similarly, within this area, a line of researchers has recognized that informal mechanisms occupy an important role in IT governance, indeed as important as formal mechanisms such as hierarchy, role definition or monitoring strategies (Peterson 2003; Sambamurthy and Zmud 1999). IT governance mechanisms, i.e., the structures, rules, processes, procedures and communication approaches each company implements in order to secure IT governance, can be either formal or informal in nature, and both types are needed in order to assure the effectiveness of IT (Peterson et al., 2003). In this context, process roles form a particularly important IT governance mechanism. Process roles are needed to enable a business process by assigning responsibilities to specific people or groups of people to maintain certain processes, coordinate process activities as well as process changes. An important example of such process role is the enterprise architect responsible for maintaining the Enterprise Architecture (EA) that describes essential components of a business and their interrelationships. The development of the EA discipline and the implied complexity resulted in the evolution of a new profession called "enterprise architect" (Strano & Rehmani, 2007) fulfilling that process role. The role of an enterprise architect is often anchored in the organizational structure of a firm to illustrate the importance and continuity of this role. Frequent interchange of the enterprise architect with business units and involvement into projects shall ensure the alignment of IT with business. As the implementation of an EA is an endless, complex and interdisciplinary process, highly skilled enterprise architects with various competencies are required (Tambouris et al., 2012).

The work of Bredemeyer and Malan (2014) provides a competency framework enabling architects to enhance their competencies. The study of Strano and Rehmani (2007) identifies miscellaneous functional roles and necessary competencies for enterprise architects. Further competencies are provided by research from (McKeen & Smith, 2002), as well as from Unde (2008). Ho and Frampton (2010) present a competency model for the IT workforce, illustrated by the role of architects. The research of Figueiredo et al., (2014) provides insights about how architects carry out their work, developing new IT systems.

In spite of all that insights, research addresses alignment and governance issues mostly at an organizational level and separated from process roles and the individual level of people fulfilling that

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