

The influence of power strategies in AIS implementation processes

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ARTICLE INFO

Article history:

Received 10 May 2018

Revised 9 February 2020

Accepted 15 October 2020

Available online 19 November 2020

Keywords:

Strategic accountants' role

Accounting information systems

Implementation processes

Power

Case study

Public sector organization

ABSTRACT

This study is based on a longitudinal in-depth case study, conducted in a Portuguese public-sector organization, where the accountants adopted a strategic business partner role and promoted the implementation of two new accounting information systems (AIS), under the context of increasing business competition. Given their role, we examined how the implementation processes of such AIS were influenced by the accountants' power strategies, adopting an organizational power narrative inquiry grounded on the four power dimensions proposed in Hardy's (1996) framework: power over resources, power over decision-making processes, power over meanings and power of the system. As a result, this study contributes to the literature available on AIS by discussing the strategic business partner role of (management) accountants in a specific case; and by offering new insights into AIS research under the topic of accounting change through the exercise of power. Our research also contributes to the literature on organizational power by providing theoretical developments to Hardy's (1996) power framework.

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1. Introduction

Research on accounting information systems (AIS) implementation processes has received increasing interest over the last decades. It has progressed along different research streams (Grabski et al., 2011; Granlund, 2011; Kocsis, 2019), with special emphasis on the study of critical success factors and barriers that can hinder such processes. Moreover, publication of this research in specialized AIS journals has mainly been centred on Enterprise Resource Planning (ERP) implementation, although it acknowledges other kinds of AIS such as management control systems and performance management systems (Kocsis, 2019). However, and as pointed out by Granlund (2011), a further avenue of research is the development of AIS research that is more focused on substantial accounting and management control problems, ensuring that research questions are not only driven by information technology concerns. The author considers that there is ample room to research AIS, particularly from the managerial reporting perspective.

Concerning AIS implementation, the organizational context in which these processes occur is an issue of paramount importance. This context is built or rebuilt by a myriad of different (internal and external) organizational actors that take

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part in shaping it over time, which is an expected outcome of these processes if one sees accounting and AIS as social constructions. Actors do not share the same perception of reality (Rikhardsson and Kræmmergaard, 2006), due to their different organizational knowledge of AIS, business and other issues of a specific organization. Thus, to fully understand AIS implementation processes, it is important to identify the set of actors involved and analyse their behaviour and interconnections over time. Prior research has considered the role of (internal and external) information technology experts (Hyvönen et al., 2009), and we consider that there is also room to explore accountants' role throughout such processes.

The role accountants play has been a debate that has been revived in the last two decades. Since the earlier study of Simon et al. (1954), some accounting researchers have studied the set of roles associated with (management) accountants (e.g. Byrne and Pierce, 2007; Lambert and Sponem, 2012; Appelbaum et al., 2017). Underlying this research stream is the argument that accountants can actively contribute to strategic change whenever they perform a business partner role. However, this research has been less published by specialized AIS journals, in contrast to the considerable attention given to the aforementioned research on technology experts. Moreover, it remains an open question whether accounting and control practice may also affect information technology (Granlund, 2011).

Although much of the early AIS research has often consisted of relatively simple, descriptive studies (Grabski, 2011), more recent literature uses or builds theoretical tools that act as a lens to fully understand the design, implementation, and use of AIS (Kocsis, 2019). There is thus an increasing trend to consider the strategic, organizational, institutional and individual factors involved in the existence of AIS. This trend implies the adoption of theoretical approaches to AIS research such as the actor-network theory (e.g. Briers and Chua, 2001; Dechow and Mouritsen, 2005; Lukka and Vinnari, 2014), the institutional theory (e.g. Granlund and Lukka, 1998; Burns and Scapens, 2000; Dillard et al., 2004; Johansson and Siverbo, 2009; Järvinen, 2016), the upper echelon's theory (e.g. Naranjo-Gil et al., 2009; Abernethy et al., 2010; Hiebl, 2014), among others. However, much of AIS research is (still) limited regarding power and political aspects, mediating and moderating performance, and other effects stemming from AIS implementation processes (Granlund, 2011).

In fact, power relations are everywhere in organisations but, in the past, were rarely addressed in AIS (Oliveira and Clegg, 2015), at least explicitly. Although there is earlier work pointing out the advantages of using a framework based on power (e.g. Markus and Pfeffer, 1983; Pfeffer, 1992), this concept continues to have a negative connotation, which seems to be the reason that has inhibited its broader discussion, and has driven researchers away from a more in-depth study of the political dynamics (Hardy, 1996; Kraus and Strömsten, 2016).

For researchers and practitioners, power issues can help in understanding and explaining how and why AIS implementation processes evolve in diverse ways in specific organizational settings, even in situations of apparent consensus, where a non-possessive view of power (Brass, 1992; Cendon and Jarvenpaa, 2001) shows that it can be shared and one's power does not need to diminish if another actor's power increases. Therefore, power can be non-threatening and can have outcomes other than "the achievement of personal or group interests" (Cendon and Jarvenpaa, 2001: 124). In this sense, power can be defined as a force (or ability) that can be used in order to achieve a desired outcome (Hardy, 1996; Kraus and Strömsten, 2016). Despite this, it appears that AIS researchers have mainly been attracted to the study of conflict and failure when approaching those processes from a power perspective (e.g. Markus and Pfeffer, 1983; Burns, 2000; Yazdifar et al., 2008; Oliveira and Clegg, 2015).

The ways in which power is used make it a multidimensional concept. From this perspective and bringing together different and relevant streams of the organizational power literature, Hardy (1996) developed a power framework with four dimensions: resources, decision-making processes, meanings, and system. She argues that the former three dimensions of power were used in the organization to constrain the fourth dimension, the power embedded in the system. Such a framework has been successfully applied in earlier studies related to AIS implementation processes at the organizational level (e.g. Burns, 2000; Yazdifar et al., 2008; Kraus and Strömsten, 2016). Even though these studies have made valuable contributions for understanding conflict and failure in the AIS implementation processes, there still is a lack of studies examining how power can be exerted (in a non-conflictual way) by (management) accountants within specific organizations.

Examining the organizational context of a Portuguese public-sector organization, (hereafter abbreviated as Post), our study addresses the following research question: "How were the implementation processes of two AIS in Post influenced by accountants' power strategies?" The main findings of our research make valuable contributions to the literature and help to address some of the gaps that have been highlighted above. More specifically, our research adds to the literature available on AIS implementation processes by discussing the strategic business partner role of (management) accountants in a specific case; and by offering new insights into AIS research under the topic of accounting change processes viewed through the exercise of power. Moreover, it also contributes to the "method theory" (Lukka and Vinnari, 2014), the literature on organizational power, by extending Hardy's (1996) framework in two main ways: by discussing the "power of the system" under the 'not-taken-for-granted' assumptions; by making empirically explicit that each of the other dimensions of power (resources, decision-making processes, and meanings) influences and is influenced by the other two.

The remainder of the study is organized as follows. In the next section, we present the literature review that guides the study, and which precedes the description of the research method. Then, in the following two sections, the findings are presented and discussed. Conclusions and contributions can be found in the concluding section.

2. Literature review

2.1. Prior research on the implementation of AIS

Literature on the implementation of AIS has followed several avenues of research (Grabski et al., 2011; Granlund, 2011; Kocsis, 2019). For Grabski et al. (2011), the studies focused on ERP are more important, especially the research concerned with the critical success factors of the systems, examining a variety of topics, ranging from system implementation, user acceptance, and adaptation to domain-specific ERP factors related to country, culture, and industry. Another avenue of research approached the implementation of non-ERP systems, such as activity-based costing and balanced scorecard, among others, and descriptions of their practical implementation were widespread (Sulaiman and Mitchell, 2005). Additionally, interpretative models of accounting change (e.g. Kasurinen, 2002) also focused their attention on the classification of critical success factors, and on barriers that can hinder the implementation processes of new AIS.

Recently, Kocsis (2019), carrying out a literature review based on AIS research and structured around the design and implementation of those systems, finds that such research has had a tremendous impact on both research and practice. The author has pointed out that implementation issues regarding ERP systems receive most attention by the specialized AIS journals. He also acknowledges other kinds of AIS, such as management control systems and performance management systems, although sometimes these are present as a component of the ERP systems. Current research does not seem to foster increased AIS research focused on substantial accounting and management control problems (Granlund, 2011). Our study aims to contribute to this gap.

The literature shows that within organizations the most common pattern to implement new AIS is authority-based from top-level management to user level (Gallivan, 2001). Thus, the implementation of these systems implies the involvement of managers at different hierarchical levels within organizations, including accountants, as well as external experts such as consultants. For instance, some researchers have analysed the relationship between the personal characteristics of top-level managers (e.g. education, gender, etc.) and the implementation of new AIS (e.g. Hiebl, 2014). However, as far as we know, the role of accountants, and other managers, did not deserve similar attention by researchers. In contrast with the perception that the nature and complexity of today's organizations, and their (business, technological) contexts, may have rendered some of the traditional roles of accountants less crucial or even obsolete, one finds that there are accountants performing a more strategic, forward-looking, collaborative oriented role within their organizations, acting as a business partner (e.g. Byrne and Pierce, 2007; Lambert and Sponem, 2012; Appelbaum et al., 2017). Accountants are not, or should not be, solely involved in aspects related to the collection and processing of data; they became, or should become, active supporters of strategic decision-making processes in organizations. So far, this business partner role has not been a relevant issue in explaining AIS implementation processes, and we consider that it might be more relevant in a context where new technologies, typically involving ERP systems, allow non-accountant professional groups, including information technology experts, to start carrying out accounting processes (Granlund, 2011; Rikhardsson and Yigitbasioglu, 2018). However, this phenomenon, usually called hybridization, could also work in the opposite way, i.e. accountants may develop expertise in information technology and therefore may influence the implementation of information technology in organizations, at least in the scope of its application to AIS (Hyvönen et al., 2009). Our research also contributes to this aspect by showing the role of accountants in implementation processes of two AIS, including its technological issues.

Much of the early AIS research has often consisted of relatively simple, descriptive studies (Grabski, 2011), instead of process approaches as Brignall and Ballantine (2004) recommend. However, the more recent literature uses or builds theoretical tools that act as a lens to fully understand the design, implementation, and use of AIS (Kocsis, 2019). Hence, researchers became aware of the need to apply different theoretical frameworks to explain the existence of AIS. For example, the actor-network theory has been used to examine the interconnection between (human and non-human) actors and the implementation of AIS systems (e.g. Briers and Chua, 2001; Dechow and Mouritsen, 2005; Lukka and Vinnari, 2014). Researchers have pointed out the myriad of different actors that are part of the network and shape the AIS implementation processes (Granlund, 2011). Whenever there are changes in that network, with changes in the set of actors, and an alteration in the overall knowledge on specific AIS, the implementation processes unfold in a somewhat non-linear way, with different detours (Andon et al., 2007). The literature also emphasizes the existence of institutional, rational, social, and organizational reasons behind the implementation of new AIS (e.g. Granlund and Lukka, 1998; Burns and Scapens, 2000; Dillard et al., 2004; Johansson and Siverbo, 2009; Järvinen, 2016). They acknowledge that the economic and political level influences the organizational field, and subsequently the implementation of new AIS. In fact, institutional and actor-network approaches accompanied by case-based methods can reach beyond relatively simple assumptions of cause and effect (Granlund, 2011). Other social theories, such as the labour process theory, act as a type of lens through which to view organizations from a broader perspective, and to recognize the social forces and related conflicts present within the implementation of AIS in organizations (Dillard, 2008). Another set of theories have focused on managers who decide to implement new AIS, studying their leadership style, motivation or characteristics (Walker et al., 2015). Based on the upper echelon's theory, researchers have suggested that the knowledge, education, and leadership style of managers are factors that drive strategic choices related to AIS (e.g. Naranjo-Gil et al., 2009; Abernethy et al., 2010; Hiebl, 2014). Surprisingly, few studies have addressed the relevance of power in explaining AIS implementation processes, at least explicitly, even though power relations are everywhere in organizations (Oliveira and Clegg, 2015). Thus, we also contribute to the literature on AIS implementation

in relation to this aspect by adopting Hardy's (1994) power framework as the theoretical lens, or method theory (Lukka and Vinnari, 2014), which guides our study. Such a framework proposes a four-dimension model of exercising power within organizations. Each of these dimensions will be presented in the following subsection.

2.2. Power dimensions

The power concept holds several meanings. Researchers generally use the single term "power", even though it has a different meaning for different people and in different contexts (Jasperson et al., 2002).

Classical definitions of power include those of Dahl (1957), Emerson (1962) and Pfeffer (1981), who see power in terms of the influence an actor has to impose on another an action that he/she would not otherwise perform. For example, "A has power over B to the extent that he can get B to do something that B would not otherwise do" (Dahl, 1957: 202-3); "the power of actor A over actor B is the amount of resistance on the part of B, which can be potentially overcome by A" (Emerson: 32, 1962; Pfeffer, 1981). These definitions are built around the ideas of conflict and resistance. They do not highlight the less visible characteristics of power in situations of apparent consensus, when conflict is not the basis of the underlying power relationships. Therefore, power should also be considered as something beyond conflictual contexts (e.g. Giddens, 1976; Burns and Scapens, 2000). According to Burns and Scapens (2000), conflict may emerge only if new rules challenge the existing routines and institutions and imply the existence of interests that are not fulfilled under the former. Thus, power relationships may be active even if there are no situations of conflict.

The exercise of power within an organization can be more or less visible and can assume multiple facets or dimensions. Hardy (1996) points out that in managerial research, power has been related to organizational resources (e.g. money, information, political access to higher echelon members). In this context, she argues that this resource-based power may be exerted by some actors to alter the behaviour of others through the deployment or restriction of some key resources. Kraus and Strömsten (2016) corroborate this idea and argue that studies on internal/inter-firm control dynamics have tended to either neglect issues related to power or focus on the power resource-based concept. This implies that attention is given to situations where power is exercised in a more visible way.

However, alternative power strategies emerged in the literature. As pointed out by Hardy (1996: S7), Bachrach and Baratz (1962) sustain that the power resource-based concept seems only to be looking at concrete acts of decision-making by specific actors, forgetting that power might be expressed not only in doing things but also in ensuring that things do not get done (non-decision-making processes). The idea that there may be something unobservable called non-decision-making was not widely accepted. There are researchers who consider that power acts of decision-making are real, and can be clearly seen, or in contrast that they are not real at all (see Clegg, 1989).

Lukes (1974) extended these two dimensions of power (resources and decision-making processes) by adding a third one, the power over meanings. A consequence of this dimension is that power may be exerted to prevent conflict, either by shaping perceptions, cognitions and preferences so that individuals accept the "status quo", or by convincing people that change should take place. This means that organizational actors tend to use different meanings to legitimize their own decisions and demands, while de-legitimizing those of others (Dhillon, 2004; Hardy, 1996). Following Latour (1986), new meanings and understanding can be created through the use of 'inscriptions', facilitator mechanisms of communication between the actors involved in AIS implementation processes (e.g. diagrams, graphs, tables, images, conceptual designs, among others). They have the power to give visibility to actions, fostering the mobilization of the actors around a specific AIS project. However, managers need to use primarily verbal forms of communication to exercise power over meanings (Hall, 2010; Kraus and Strömsten, 2016).

Another dimension of power emerged from the works of Foucault (e.g., 1979; 1980; 1982). He conceptualizes power as a 'technique' that achieves its effects through its disciplinary character (Dhillon, 2004). It means that to understand power one must not ignore the values, traditions, cultures, and structures of a given organizational system (Hardy, 1996). In Foucault's post-modern conception, power is exercised rather than possessed and its exercise is not viewed as a one-way process (Cendon and Jarvenpaa, 2001), and power relations are not necessarily in the form of control exercised by the prevailing authority (Avgerou and McGrath, 2007). They are multidirectional, operating top-down and bottom-up. The emphasis on interdependence rather than on dominance and resistance means that power can be exercised in a non-threatening way, and its exercise may be directed towards benefiting the organization, instead of following the opportunistic interests of some organizational groups (Cendon and Jarvenpaa, 2001). For Foucault, the "power of the system" relations are positive and productive, and not simply negative. This perspective of power is of importance, mainly when the analysis of organizational processes by which power is exercised is at stake.

Hardy (1996) offers a comprehensive approach to power, proposing a synthesis of most of the ideas and the four dimensions discussed above. The first dimension, power over resources, is defined as the power exercised by organizational actors "to influence decision outcomes and bring about desired behaviour through the deployment of key resources on which others depend" (Hardy, 1996: S7). It relates to political power over organizational resources such as information, expertise, political access, credibility, stature and prestige, the control of money, rewards and sanctions. Accumulation and use of these kinds of resources will help organizational actors to convince others to do something that otherwise they would not do (Dhillon et al., 2011; Kraus and Strömsten, 2016). However, as Hardy (1996) points out, this dimension is too task-oriented, and thus organizational actors must also use other power dimensions.

The second dimension, power over decision-making processes, encompasses the power exerted by “dominant groups to influence outcomes by preventing subordinates from participating fully in decision-making” (Hardy, 1996: S7). Relevant organizational actors make use of procedures and routines to influence outcomes behind the scenes (Cendon and Jarvenpaa, 2001). Even though this power dimension has typically been associated with non-decision-making processes to protect the “status quo” of dominant groups within organizations, Hardy (1996) argues that the organizational procedures and routines can also be used by them to bring about change, and that this dimension can produce more generalized and long-term changes than the resource power dimension.

Power over meanings, the third dimension, is exercised in order to either influence people's perceptions, cognitions and preferences so that they will accept the “status quo”, or to convince people that change should take place (Hardy, 1996; Dhillon et al., 2011). In both situations, meanings are used to prevent the emergence of conflict. As pointed out by Dhillon et al. (2011: 5), “through the symbolic use of icons, rituals and language, change is given a new meaning, making it appear legitimate, desirable, rational or inevitable”. One can see overlaps between Hardy's dimension of power and the three tactics of power (discursive, interaction, and non-threatening negotiation tactics) advocated by Cendon and Jarvenpaa (2001). The clue that binds both proposals and creates the overlaps is persuasion, the effort to make others accept a given organizational move, for example a particular change/improvement in the existing AIS.

Hardy (1996) argues that the aforementioned three dimensions of power can be used to constrain the fourth dimension, the power of the system, to bring about change. She also argues that this dimension of power is deeply embedded within the organization and is supported by the ‘unconscious acceptance’ of existing, prevalent organizational values, traditions, cultures, and structures. Even though the power of the system imposes strong limits on organizational actors' actions during the implementation of the information systems, they have some scope in modifying it through the mobilization of resources, processes and meanings (Dhillon, 2004; Yazdifar et al., 2008; Dhillon et al., 2011). Thus, the power of the system is the backdrop against which decisions are taken over time (Hardy, 1996).

In accounting literature, Hardy's (1996) framework was also applied by Burns (2000), Yazdifar et al. (2008), and Kraus and Strömsten (2016). Although these studies have valuable contributions to make in our understanding of the power in organizations, the implementation of AIS is still an area with many open-ended questions. There is a need to study how power could be exercised by accountants in a non-conflictual way. Furthermore, there is a need to research how each strategic dimension of power is interrelated to the other dimensions. Our study contributes to addressing these gaps.

3. Research method

We had the opportunity to carry out a research project at Post during the simultaneous implementation of two AIS: The Profit and Loss (P&L) and Key Performance Indicators (KPI) systems.¹ After obtaining preliminary evidence, we observed the corporate level impact of these systems and noted that the Planning and Control Office (PCO) managers, a group of management accountants, were the main protagonists of the implementation processes [see Appendix A]. We were strongly motivated from the outset to explore the ongoing implementation processes of these systems to be carried out through a longitudinal in-depth case study. However, it was not clear for us at the time how the PCO managers would drive such processes and which strategies they would follow. This has changed due to our perception that power relationships were involved, and our increased knowledge on the multidimensional views of power. We later acknowledged that we had a valuable AIS implementation case study to be explained through different power strategies.

The study of the P&L and KPI implementation processes in Post allowed us to analyze a significant amount of documentary data produced by the main protagonists [see Appendix B], i.e. the PCO managers, including internal communications signed by them, by other operational managers and by Board members. We also conducted several interviews with the PCO managers [see the list in Appendix C] in order to explore new issues and to complement or validate issues under analysis. In addition, we interviewed a Post consultant, who was involved in the implementation of other projects related to the business areas, in order to understand why the management consultancy firm, which he belonged to, was not involved in the P&L and KPI implementation processes. Together the documentary data and the interviews allowed us to build up a profile of the PCO managers' views.

To obtain a similar profile of the managers from the other organizational areas regarding the implementation of the P&L and KPI systems, we conducted a total of 14 in-depth, face-to-face interviews with first- and second-line managers from seven different organizational areas [see the list in Appendix D]. We used the interviews with these managers, along with documentary data exchanged between them and the PCO managers, in order to understand their participation in the above-mentioned implementation processes. In doing so, we considered the ‘discourses’ of the different organizational actors involved in these AIS implementation processes (Truex et al., 2000), and not solely that of the PCO managers.

Interviews were recorded, transcribed into the original language (Portuguese) and then translated into English. We also took brief notes during and after each interview in order to record ‘other’ information that was not captured on tape or that was difficult to extract from it. Such notes ranged from observations of facial expressions, voice intonation and gestures, to periods of extended silence. In addition, notes were taken during those parts of the interviews in which the interviewees requested not to be taped. As well as this, some interviewees gave extra information once the tape recorder had been

¹ Details about the P&L and KPI systems are given in the “Field study” section.

switched off. For this reason, at the end of each interview, with the tape recorder switched off, we always allocated time for an informal exchange of information.

Before beginning the interview procedure, we designed an interview guideline [see Appendix E]. This guideline was based on the literature reviewed and our research goals in relation to this topic, and followed the criteria established by [Strauss \(1987\)](#) to open up further questions about other phenomena or other aspects of the same phenomena. The prepared guideline aimed to increase the reliability of our data by ensuring that we followed similar criteria in questioning the interviewees in each of the different sections of the interview. We established general topics, stimulating discussions and the interchange of information, and the questions were designed to avoid directing or limiting possible answers ([Yin, 1994](#)). Although we used a guideline for questioning the interviewees, they were encouraged to do “all the talking” in the hope that new perspectives would emerge. Prior to each interview, we reviewed the data collected from previous interviews and the documentary data gathered until that point in time. As a result, the transcripts, notes, internal company documents, reviews and summaries available, formed the background of each new interview. To avoid confusing the interviewees, questions were not expressed in academic jargon.

We thus obtained several types of evidence from diverse sources. No relevant contradiction between the interviews and the available documentary data was found. Although the data was not collected very recently, the vast amount of evidence collected allowed us to revisit the P&L and KPI implementation processes in Post from a multidimensional power perspective. Moreover, the study of the AIS implementation processes continues to be a relevant topic to academics and practitioners, particularly regarding power and politics aspects, as pointed out by [Granlund \(2011\)](#).

The data analysis in our study was an interactive process. Firstly, we used data collected from interviews, written documents, notes, etc., to establish a chronological account of the main implementation phases of each AIS (P&L project and KPI project) and then we used coding to differentiate and combine the data. The aim of this step was to give order and meaning to the data collected. Secondly, data analysis consisted of data reduction and creation of patterns and categories ([Miles and Huberman, 1994](#)). We coded the interview transcriptions and the documentary information based on the four power dimensions of [Hardy's \(1996\)](#) framework. Lastly, tables listing issues frequently raised in interviews and documentary data were prepared with the aim of enhancing the identification of patterns and categories. Finally, conclusions were drawn and verified. [Yin's \(1994\)](#) four tests for establishing the quality of empirical social research – construct validity, internal validity, external validity and reliability – were also followed throughout the phases of gathering evidence, analysis and generation of conclusions.

4. Field study

4.1. An overview of the company

Post was a large Portuguese company belonging to the public sector at the time of our study (today, it is a private listed company). It operates in four markets: mail; parcels and express mail; financial services; and data and documents. Mail is its most important market, with parcels and express mail ranking second, as reported in the annual reports analysed.

The company has faced increasing competition in its main markets because of major changes that have taken place in the postal sector, which include the further liberalisation of the Internal Market for postal services. Firstly, an ongoing process of deregulation was initiated in 2000, the year in which the European Community postal services opened up to competition [European Community legislation] and started to reduce the exclusive business area of the company. This liberalisation has attracted new operators and increased competition, especially in urban regions and in the more profitable business markets. Secondly, innovative technologies have also had a significant impact on the postal sector with the huge proliferation of email and the growing use of text messaging. Both of these electronic means of communication are replacing surface mail, which until recently has been the traditional means of communication and Post's core business. However, the company has developed new technological products and services such as hybrid mail, digital certification, e-government services, e-logistics, and reverse hybrid mail [Annual reports]. These changes in the external environment implied new competitive challenges for Post managers, and also for (management) accountants, given their role in the organization and also because they were able to be strategic business partners to other managers and when reacting to such challenges. The new competitive challenges drove them to apply strategies, which we referred to as power strategies, to implement new AIS that would help the other Post managers to better manage the postal business within a context of increasing competition.

As a public sector company, the Post's Board of Directors were composed of five members that were chosen by the Portuguese Government for a three-year period [Board Member Nominations]. Thus, their members tended to be linked to the Portuguese Government's governing political party, and its political 'family'. The main outcome of this link was that changes in the Portuguese Government frequently led to the replacement of the Board members. Moreover, significant changes in the Board of Directors in turn often led to the replacement of a considerable number of first- and second-line managers [Nominations of first- and second-line managers]. These replacements tended to occur because first-line managers were appointed by the Board of Directors. However, the time span of our study and the implementation of the P&L and KPI systems, fell under the mandate of a specific Board of Directors, with no change in its members.

4.2. The planning and control office (PCO): its role in the organization

The PCO was (and still is) an internal organizational area of Post at the corporate level composed of management accountants [see Appendix A]. It was organized into three broad working departments: planning, control, and information management. The three (second-line) management accountants of these departments and the head of the PCO had worked together for a very long time, thus ensuring stability in the top management of the office. Within Post, the information management department was also known as “PCO’s IT nucleus”, which was its previous name. Before July 2002, each (macro) organizational area of Post had a department named “IT nucleus”, but they were closed down by the new Board of Directors. The “PCO’s IT nucleus” was the exception, which continued operating under a new name. The PCO managers consider that *“the issue of information systems in the management control process is a key one”*, as explained by one of them and explicitly recognized by a manager from the IT area as follows: *“This quasi-IT group needs to have the capacity to manipulate the ETL (Extraction, Transporting and Loading) information process. The fact that they have this group and the know-how and capability affects our job”*.

The main (macro) organizational areas of the Post had an internal Planning and Control Department (PCD) composed of management accountants. The PCDs were small areas managed by second-line managers, and each usually employed one or two management accountants. One of their fundamental roles was to help to interpret data made available by the PCO and prepare this information for their first-line managers as explained by a PCD manager from a business area: *“There is a monthly plan-control meeting with the Board. At this meeting, managers have to justify deviations. They have to say why such-and-such happened and so on. This has to be documented and, in my area, the documentation is provided by me”*. The PCDs were also the main counterparts of the PCO managers during the implementation processes of the P&L and KPI systems, as portrayed by a PCD manager from another business area: *“I have actively participated in the KPI and P&L implementation processes because I have been the interlocutor for this business area”*.

Since 1995, the PCO has managed an Executive Information System (EIS), which provides business information regarding costs, investments, commercial and human resources. This information has been available in various formats such as time periods, cost centres, product families, projects and organizational areas [EIS reports]. An information update has been carried out on a monthly basis and provided online by the EIS to about three hundred people in Post, two weeks after the end of each month. Such information, which includes planned and actual figures, as well as variances, has been analysed in monthly control meetings attended by the Board members and first-line managers, including the head of the PCO.

However, the PCO managers aimed to extend the existing accounting information analysis (mainly provided by the EIS). They intended to implement a P&L system to prepare income statements per business area, and a KPI system based on the balance scorecard rationale [Strategic Information Systems Plan for a 3-year-period]. As the PCO managers explained to us, the implementation of these two AIS was needed because the company was expected to face increased competition due to the significant changes that were taking place in the postal sector. These managers believed in the usefulness of P&L and KPI systems for Post.

4.3. AIS implementation processes

At the end of January 2003, the PCO revealed the plan to implement both AIS during a launch meeting with first- and second-line managers of Post [PCO plan for the development of the P&L and KPI projects, Kick-off meeting]. In this plan the P&L was defined as a *“system which provides monthly income statements by area even for the lower levels of the organizational structure and which includes an internal transfer pricing model”*. The KPI was defined as a *“system which provides a set of key performance indicators on a monthly basis, thus allowing the Board to monitor the implementation of the strategic goals of the company”*. Apart from defining the scope and aims of the systems, the plan also justified their needs in the increasingly competitive context, identified the team, and set the calendar for the distinct phases of the implementation of both systems. We found consistency between the contents of this plan and arguments provided by the PCO managers in the interviews.

In February 2003, it was decided to implement the P&L and KPI systems. Both implementation processes followed a similar *modus operandi*. Making use of their cumulative expertise on such kinds of AIS, clearly evidenced by the aforementioned PCO plan, during the first phase, the PCO managers prepared an initial (conceptual) proposal for each of the AIS and sent it to the other organizational areas to gather their comments and suggestions for improvement.

In the case of the P&L, the proposals included a list of potential internal transfer prices for each business area [P&L project – A first draft of internal transfer prices between business areas, March 2003]. The PCO managers launched a proposal with all the activities they had previously identified, for the other Post managers to add to or remove from, to propose prices and defined what the price rationale was and so on. As pointed out by a PCO manager, it was important *“to sell the P&L ideas properly because it is highly dangerous to say that making a profit is always good”*.

In the case of the KPI, the proposals contained a list of key performance indicators for each (macro) area of Post [KPI Project – A first draft of key performance indicators for business areas, April 2003, and for shared and corporate areas, August 2003], organized into four perspectives – financial, market/customer, resources, and processes/service quality – and linked with the strategic objectives of the company for each of them [see Appendix F]. The PCO managers’ proposals contained extra key performance indicators, allowing each organizational area to define its specific set.

Then, during the second phase, the organizational areas of Post analysed the PCO (conceptual) proposals, with the PCO managers working as partners to explain in detail the concepts they contained. As explained by a PCO manager: she went

along with her PCO colleagues “and spoke to all the managers [first- and second-level managers], because this took place at the managerial level”. She added that they “went in there and explained all the concepts etc. in meetings with the managers”. In the case of the P&L, the negotiation of the internal transfer prices (rational and value) occurred between business areas, under the support of the PCO managers, as evidenced by internal communications signed by business managers. Furthermore, these managers had agreed with this *modus operandi*, as explained by one of them: “each one of the business units came up with internal transfer price proposals, which were very largely based on the costs of the respective operations. However, this was followed by a series of price-levelling negotiations that allowed us to reach deals on all of them”. There were thus intensive interactions and negotiations between business areas, as evidenced by internal communications and interviews. We found that the negotiations took some time but were developed in a friendly environment, and agreements were reached at the end, resulting in the final proposals to be approved by the Board of Directors [P&L Project – Overview and final outcomes, Board meeting, September 2003].

In the case of the KPI, such interactions and negotiations occurred between each (macro) area of Post and the PCO managers. This was neatly portrayed in the following statement of a manager from the human resources area: “The key performance indicators were debated between the PCO managers and each organizational area. They carried out admirable and innovative work. For each organizational area, they launched a list of potential indicators. Then, each organizational area accepted or rejected indicators from that list and created others”. In the same vein, a manager from another business area stated that: “The proposal stated how the key performance indicators would be calculated, what the form of calculation would be, which key performance indicators would be used and what the pre-established intervals would be”. This business partner role carried out by the PCO managers was thus clearly recognized by Post managers. Initially, the PCO only proposed key performance indicators for first-level management areas. The key performance indicators for second-level management of each area was left in the hands of the manager of the respective organizational area. In November 2003, the PCO presented the ongoing KPI project to the Post Board [KPI Project – Current stage, Board meeting, November 2003]. At this time the definition of the sources of information for each key performance indicator was still taking place, as explained by the PCO managers. One of them stated that “the KPI project has taken up the whole year and will continue for some more time”, which was concluded during the first semester of 2004 [KPI Project – Overview and final outcomes, Board meeting, July 2004]. The KPI implementation processes took longer to implement than the P&L processes due to their larger scope, involving managers from all Post organizational areas (business, shared and corporate areas). In both AIS, we found that the processes were facilitated by the existence of a PCD in each organizational area. These management accountants enabled a more fluid dialogue between the PCO managers and the other Post managers, helping the PCO managers to “sell” the concepts inherent to each AIS.

During the third phase, and for each of the systems, the PCO managers and the IT area worked closely to choose the P&L and the KPI software applications [Internal communications]. We determined that the PCO Information Management Department developed the technical specifications to be made available for the IT area. Then, this area, considering the technical specifications of each AIS and the IT architecture of Post, selected a set of IT suppliers to develop a prototype to be analysed by managers from both the IT area and the PCO. This was also portrayed by a manager from the IT area: “IT suppliers were asked to develop a prototype. . . . An analysis was then carried out by the PCO and the IT area. We agreed on which of the technologies to choose”. Another manager from the IT area pointed out that the PCO managers “had been very active in the choice of the technological solutions for the P&L and KPI”. Evidence indicated that the PCO and IT managers worked together more as partners than as competitors.

We found that during the overall implementation processes, the head of the PCO kept the top-level managers informed of the development stages. Apart from informal feedback, formal mechanisms were also used. The stages of the ongoing AIS implementation processes were continuously reported in the monthly control meetings, in which the Board Members and the first-line managers of Post took part, and presentations were made to the Board of Directors to provide the main achievements of the P&L and the KPI systems.

To sum up, both AIS were implemented by the PCO managers, with the collaboration of the managers from the other organizational areas of Post and with the support of the Board of Directors. Based on the documentary data produced by the different organizational actors and the interviews that we carried out, there is evidence of peaceful implementation processes, whereby the Post managers’ strong collaboration and the Board of Director’s commitment were recognized by the PCO managers. However, these processes cannot be completely understood unless one discusses the different power strategies exercised by this group of management accountants over time. The next section discusses these strategies.

5. Discussion of the accountants’ power strategies

Based on Hardy’s (1996) framework, we discuss in a structured way the different power strategies (resources, decision-making processes and meaning) adopted by a group of management accountants, the PCO managers, during the implementation processes of the two AIS described above, the P&L and KPI, taking into consideration the organizational context of Post, i.e. the dimension related to the power of the system. An important aspect of this discussion is the business partner role played by these accountants throughout the AIS implementation processes, showing how they had managed in a coordinated way those different strategies of power.

5.1. Power over resources

During the implementation of the AIS, the PCO managers exercised their power at the level of the resources. An example of this power dimension can be seen in the accumulation and usage of the expertise necessary to implement the two AIS. Those accountants had long endeavoured to broaden their knowledge in the concepts of both AIS and they were recognized as experts in these kinds of systems. The head of the PCO chose to be trained on such AIS and encouraged her team members to take similar training. For example, the head of the PCO stated: *"I worked a little on the concepts of the BSC. I went abroad. I read all of Kaplan's and Norton's books. I attended a course where they lectured"*. Moreover, through its information management department, this group of management accountants had also accumulated IT expertise, which allowed them to be very active in the choice of the technological solutions. Within Post these accountants were perceived as understanding a great deal about decision-making support systems, whose expertise allowed them to interact knowledgeably with the IT area as business partners and thus influence the information technology implemented in Post, at least in the scope of its application to AIS (Hyvönen et al., 2009).

The perception of other Post managers, including the IT managers, that PCO managers possessed the necessary expertise to carry out the implementation of these AIS, seems to be one of the reasons that led them to recognize and accept their business partner role, as actively contributing to strategic change (e.g. Byrne and Pierce, 2007; Lambert and Sponem, 2012; Appelbaum et al., 2017), and explains the absence of conflict, which is in contrast to the case reported by Burns (2000). This is an important finding of our study. It shows that the PCO used its accumulated expertise (power over resources) to progressively work the concepts underlying the AIS with the other Post managers, without conflict, fostering the use of another power dimension: power over meanings. Thereafter, a successful spread of meanings reinforced the 'perceived' expertise of the PCO managers from the perspective of the other Post managers, and the latter were more inclined to view these accountants as business partners.

The expertise of the PCO managers in such kinds of AIS was also perceived by the Board of Directors. Since 1995, they had been responsible for the major AIS of Post: the EIS. The control of this important resource by the PCO managers allowed them to work as business partners and influence decision-making processes at the top-level management. A consequence of this influence was the amount of financial resources the Board of Directors granted to the PCO during the implementation of the AIS processes. Examples of these resources were the large investments in the P&L and the KPI software applications, and the hiring of human resources to develop them. Thus, power over (existing) resources could influence (and be influenced by) power over decision-making processes.

The PCO had also mobilized resources to enable and foster dialogue with the other organisational areas. On the one hand, there were PCDs in all Post organisational areas and they were important resources in terms of facilitating such dialogue. They were, therefore, a privileged means for the PCO to diffuse the concepts inherent to the new AIS. On the other hand, the PCO Information Management Department allowed management accountants to have an educated dialogue with the corporate IT area, regarding the implementation of the new AIS (Hyvönen et al., 2009).

In brief, we have evidence demonstrating power over resources exerted by the accountants during the AIS implementation processes, and its relationship with other power dimensions. We found that the exercise of power over its "less visible" dimensions required managing resources. However, relying solely on the power over resources would make the analysis too task-oriented (Hardy, 1996; Burns, 2000; Kraus and Strömsten, 2016). To reinforce their business partner role the accountants needed to go beyond the exercise of power over resources. Thus, we go on to explain (in more detail) the power over decision-making processes exerted by accountants during the P&L and KPI implementation processes.

5.2. Power over decision-making processes

Like other public sector organizations, the Post Board members were chosen by the Portuguese Government and, then, first-line managers were appointed by the Board of Directors. In Post, there were about twenty first-line managers responsible for the business, corporate and shared areas (see Appendix A). These managers were advised by second-line managers, who were also appointed by the Board of Directors, following the suggestions of first-line managers. Underlying our research on the implementation of strategic systems are top-level decision-making processes.

First- and second-line managers of the Post perceived that PCO managers were significantly heeded at top-level management. Despite changes in the Board of Directors, the PCO enjoyed a stable status in the organization over time, which helped to strengthen the position of its managers, and particularly that of its head, who had been there since 1995. According to Cendon and Jarvenpaa (2001), the power of organizational actors will be influenced by their hierarchical position, their range of control over other organizational actors, and their position either as core or supported units of the organization. The privileged hierarchical position of PCO seems to be partly due to the fact that its managers were the supervisors of a strategic AIS, the EIS, mentioned above, which was the main provider of information for the monthly control meetings, in which the Board members and the first-line managers took part, including the head of PCO. These meetings allowed the PCO managers to reinforce their business partner role. Moreover, as pointed out by Hardy (1996), organizational procedures and routines can also be used by organizational actors to bring about change, as was seen in the case of the P&L and the KPI systems.

We consider that the regular meetings of the top-level management were a place for the PCO to exercise power over decision-making processes, particularly in granting access to the financial resources this office needed to implement new AIS. Thus, exercising power over decision-making processes has a (positive) impact on the exercise of power over resources.

Furthermore, the monthly control meetings were also an opportunity for the PCO to intensify the interconnections with first-line managers of the other organizational areas of Post and inform them about the benefits of implementing the P&L and KPI systems. These interconnections and the privileged hierarchical position of PCO could be seen as structural factors (Cendon and Jarvenpaa, 2001) that allowed it to exercise its power over decision-making processes. The outcome was the increasing ability of the PCO managers to influence the other managers, including the Board members, on the importance of implementing the new AIS, thus performing a business partner role (Byrne and Pierce, 2007; Lambert and Sponem, 2012; Appelbaum et al., 2017). In so doing, the PCO managers secured the commitment of Post top-level managers to the dissemination of meanings related to the P&L and KPI in the entire organization. This is an important finding of our study. It shows that exercising power over decision-making processes also has a (positive) impact on the exercise of power over meanings.

5.3. Power over meanings

Concerning the power over meanings, the PCO also exercised this power on the other Post managers, including the Board members, to achieve the implementation of the P&L and KPI systems. Its strategy involved a progressive dissemination of the aims of these AIS, as well as their inherent concepts. The PCO managers justified their implementation as a way of responding to the new competitive challenges the company was facing due to the ongoing changes that were taking place in the postal sector. They advocated that the AIS would assist the needs of Post in each real context, as explained by one of them: *"These initiatives aim to respond to our current competitive context. (...) the information practices should be in line with the strategic objectives of the Company"*. These arguments were successful and the P&L and KPI systems became part of the Strategic Information Systems Plan.

In this context, to exercise power over meanings on the other Post managers, the PCO managers made use of discursive, interaction and non-threatening negotiation tactics emphasized by Cendon and Jarvenpaa (2001). First, they created an organizational climate to ensure the acceptance of the AIS through discursive tactics. They 'sold' these AIS based on their innovativeness, i.e. based on the desire to 'do things differently', and on how pivotal they would be in facing the increasing competition. These messages were frequently emphasized, before and during the implementation processes, both through formal and informal channels, reinforcing the business partner role of these management accountants.

Moreover, to progressively disseminate the previously mentioned benefits, PCO managers made use of interaction tactics. During the AIS implementation processes they promoted frequent meetings with the other Post managers to explain the concepts inherent to the systems, as well as to help them with the overall implementation processes. This dissemination of meanings was intentional, as clearly stated by one of the PCO managers: *"We have attempted to disseminate the concepts in a progressive way"*. Through this means of dissemination, apart from the use of verbal forms of communication to exercise power over meanings (Hall, 2010; Kraus and Strömsten, 2016), the PCO made use of different 'inscriptions', using Latour's (1986) terminology, which helped them to 'translate' new knowledge to the Post managers. Among such inscriptions were the aims of the P&L and KPI stated in the Strategic Information Systems plan, the conceptual designs of both systems, e-mails exchanged between PCO managers and the organizational actors involved in the implementation processes, PowerPoint presentations in meetings with other managers, etc., which enabled those managers to communicate new meanings and understanding related to the AIS.

Finally, aware of the need to reach a consensus to achieve the successful implementation of the processes, the PCO managers made use of non-threatening negotiation tactics. These were relevant to achieve a high level of involvement of the Post managers, and to reach the agreements we reported in the field section, which resulted in a successful outcome, the implementation of the P&L and KPI systems.

Hence, acting at the level of meanings, the accountants reinforced their business partner role and prevented the emergence of conflict (Hardy, 1996; Dhillon et al., 2011) and convinced Post managers that change should take place. They also influenced the decision-making processes and secured the resources they needed to implement the AIS. Thus, apart from being influenced by the other two dimensions of power discussed above, the power over meanings also influenced them.

5.4. Power of the system

It is argued in AIS literature that the 'power of the system' encompasses most members in its web (e.g. Burns, 2000; Yazdifar et al., 2008). As Hardy (1996: S8) states, *"We must not ignore the power embedded deep within the organizational system that everyone takes for granted. This power is often beyond the reach of tampering by organizational members. It lies in the unconscious acceptance of the values, traditions, cultures and structures of a given institution and it captures all organizational members in its web"*.

During the implementation processes of the P&L and KPI systems, the Post organizational context was characterized by much behaviour based on 'taken-for-granted' assumptions. Institutional studies have emphasized this kind of behaviours in the implementation of new AIS (e.g. Burns and Scapens, 2000; Johansson and Siverbo, 2009). In terms of (management) accounting practices, among others, the annual planning and budgeting processes, and the monthly control meetings, are examples of such practices that have been carried out in Post based on 'taken-for-granted' assumptions. Those practices are an expression of the power of the system and were validated by successive Boards of Directors and other organizational actors throughout the years.

However, we gathered evidence that the power of the system in Post also led to behaviour based on 'not-taken-for-granted' assumptions. This behaviour has arisen from existing uncertainties at the system level, which in turn had an impact on the organizational practices of Post, including those related to the AIS. As discussed above, the way Boards of Directors were appointed caused instability at the top-level management each time a new Portuguese Government took office. We shall acknowledge that the economic and political level influences the organizational field, and subsequently the implementation of new AIS (Dillard et al., 2004). When there were Board changes, and they were frequent, for some time there was widespread uncertainty within Post. Based on interviewees' statements, we gathered evidence showing that usually the incoming Board members changed many of the projects underway at the time, put others on hold, and recovered others that had been previously postponed. Aware of this, some Post managers who held top-level positions, primarily first-line managers, tried to distance themselves from the Board members still in office in the phase before a new Board of Directors was appointed, seeking a "pole position" that would allow them to impress the new Board of Directors, even before they knew who would be appointed. Whenever a new Board of Directors was sworn-in, the existing power structures were more closely questioned and new structures emerged. Whether the new Board of Directors decided to maintain Post managers in their privileged hierarchical positions, or not, was partially influenced by their previous work, but this was not taken for granted by the organizational actors. Friendship and political connections were particularly important in the selection of Post managers. Previous evidence showed that a new Board of Directors always implied many changes at the level of first- and second-line managers. Thus, various actors, especially the current first-line managers, attempted to secure their places in the most privileged positions of the organization's power structures. These positions afforded them privileged access to the decision-making processes (power over decision-making processes), and to the availability of resources (power over resources), and more opportunities to promote their ideas (power over meaning) at the heart of the organization². This kind of "musical chairs" game began a few months before the arrival of a new Board of Directors and continued for months afterwards, implying that during the transition period to new power structures behaviour based on 'not-taken-for-granted' assumptions were clearly revealed by organizational actors. Thus, apart from behaviour based on the 'taken-for-granted' assumptions, there was also unmistakable evidence of behaviour based on the 'not-taken-for-granted' assumptions mainly caused by the frequent replacement of the Board members, which always affected Post power structures. This is undoubtedly a contribution of the current study to the organizational power literature. In effect, this view of the 'power of the system' dimension extends Hardy's (1996) 'power of the system' conception, introducing a more dynamic and interdependent role between this power dimension and the other three dimensions of power (resources, decision-making processes and meanings) throughout time.

5.5. The business partner role of accountants and the use of power strategies

As a consequence of ongoing changes in business and technological organizational contexts, researchers began debating the transformation of the role of (management) accountants. Among the different roles they have been associated with, the business partner role has motivated researchers to understand how accountants have performed it in different organizations and contexts (e.g. Byrne and Pierce, 2007; Lambert and Sponen, 2012; Appelbaum et al., 2017).

However, as far we know, this business partner role has not been a relevant issue in explaining AIS implementation processes. The current study contributes to fill in this gap. The empirical evidence discussed above highlights the business partner role of accountants in such a type of processes, providing evidence on how they can perform a more strategic, forward-looking, collaborative oriented role to implement new AIS. We found that accountants developed a coordinated strategy based on different dimensions of power (resources, decision-making processes and meaning), which allowed them to influence the implementation processes of two strategic AIS in a public sector organization, involving continuous interactions with many other organizational managers.

We consider that this strategic role of accountants is even more relevant in a context where new technologies, typically related to ERP systems, are allowing non-accountant professional groups, including information technology experts, to start carrying out accounting processes (Granlund, 2011; Rikhardsson and Yigitbasioglu, 2018). Moreover, this study also provides evidence on how accountants had influenced information managers throughout the AIS implementation processes and, thus, how accounting and control practice may also affect information technology (Hyvönen et al., 2009; Granlund, 2011).

Concerning the way accountants had mobilised the different dimensions of power to implement the new AIS, the empirical evidence discussed shows contrasting differences in relation to previous studies (Burns, 2000; Yazdifar et al., 2008;

² It is not within the scope of this study to discuss the power structure formation process. This would imply an extension of the analysis to a more macro level.

Kraus and Strömsten, 2016) that had applied the same framework to explain intra-organizational accounting change processes. Whilst these studies have reported situations of conflict between organizational actors during the implementation of new AIS, the evidence we found and described is better characterised by its non-conflictual manner. The way such actors have used the different dimensions of power may explain much of the difference. Contrasting with those studies, the evidence in our case suggests that a coordinated mobilisation of the three dimensions of power (resources, decision-making processes and meaning) is needed from the outset of the process in order to achieve a non-conflictual AIS implementation. Moreover, the existence of “not-taken-for-granted” assumptions in our case is also a distinctive aspect of the organizational context that affects the implementation outcome and helps to improve our understanding of the “power of the system” dimension.

6. Conclusions and contributions

This study analyses how the implementation processes of two AIS in Post, a Portuguese public-sector organization, were influenced by the business partner role of accountants and their power strategies. Applying the dimensions of power proposed by Hardy's (1996) framework, it expands our understanding of such dimensions and make sense of the strategies adopted in implementing those systems. Without a multidimensional power analysis, the consistency of such strategies would be difficult to perceive.

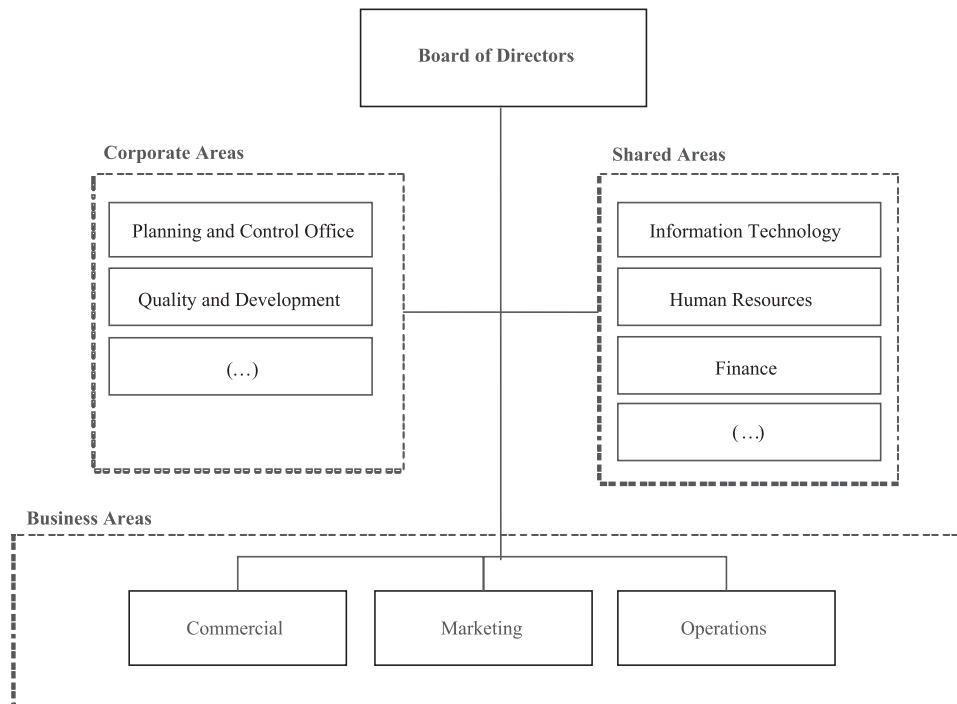
This study makes several important contributions. First, it adds to the literature available on AIS implementation processes where (management) accountants – PCO – performed a strategic role, in a specific case, acting as a business partner (Byrne and Pierce, 2007; Lambert and Sponem, 2012; Appelbaum et al., 2017). They applied multiple power strategies (resources, decision-making processes and meaning) throughout the AIS implementation processes to benefit the organization, instead of following opportunistic interests (Cendon and Jarvenpaa, 2001). The outcome was the implementation of two new AIS without conflict due to the accountants' ability to influence the other managers throughout the AIS implementation processes, including those of the IT area, in contrast to other studies that have mainly reported cases where power and conflict go “hand in hand” (e.g. Burns, 2000; Yazdifar et al., 2008; Kraus and Strömsten, 2016), possibly due to the lack of a coordinated mobilisation of the three aforementioned dimensions of power from the outset. This accountants' ability was supported by their (technical) accounting and non-accounting expertise, their accumulated knowledge of the organizational context, including business processes and information technology. For instance, these accountants had developed expertise in information technology and therefore, working close to the IT area managers as business partners, influenced the software applications that were chosen for the AIS. This situation shows accountants going beyond the traditional accounting sphere, developing expertise in information technology, at least in the scope of its application to AIS (Hyvönen et al., 2009).

Second, this study also makes a useful contribution in guiding accountants and AIS managers through the different manifestations of power in an organizational setting. It provides practical insights into the way AIS implementation processes can evolve and be affected by managers' exercise of power, considering the nature and complexity of today's organizations and of their (business, technological) context. Thus, with a better picture of the organizational context, accountants can manage the (several) power strategies to achieve the successful implementation of AIS systems more effectively.

Third, our study also contributes to the “method theory” (Lukka and Vinnari, 2014), by extending Hardy's (1996) framework. Concerning “the power of the system” dimension, it enhances our understanding of this dimension beyond the ‘taken-for-granted’ behavioural assumptions. In fact, at the system level, we also identified behaviour based on the ‘not-taken-for-granted’ assumptions, extending in this way the ‘power of the system’ dimension of that framework. These types of behaviour may arise from existing uncertainties at the system level within organizations, which in turn had impacts on the organizational practices, including those related to the AIS and their implementation. Hence, this new perspective on “the power of the system” dimension brings a more complete understanding of organizational actors' behaviour. Furthermore, our empirical findings make empirically explicit that each strategic dimension of power (resources, decision-making processes, and meanings) influences and is influenced by the other two. We derived hard evidence on how these dimensions of power are intertwined throughout time. For example, when the accountants successfully exerted power over meaning their power over resources and decision-making processes was reinforced.

Despite its valuable contributions, this study is not exempt of limitations. The main limitation is that the case study was conducted in a specific context and generalization of the conclusions of our research should occur only from a theoretical perspective. Therefore, further case studies are needed to strengthen our understanding of the dynamics of multiple power dimensions in AIS implementation processes, both in public and private sector organizations. Another fruitful avenue for further research on the topic could be the study of how managers come together and balance the power over resources, decision-making processes and meanings throughout the implementation of AIS systems.

Appendix A. Main (macro) areas in the organizational structure of Post



Appendix B. Main documentary data

Annual reports
 European Community Legislation, regarding the ongoing process of deregulation
 Executive Information System (EIS) reports
 Internal communications signed by Board members, PCO managers and other Post managers
 KPI Project – A first draft of key performance indicators for the business areas, April 2003
 KPI Project – A first draft of key performance indicators for shared and corporate areas, August 2003
 KPI Project – Current stage, Board meeting, November 2003
 KPI Project – Overview and final outcomes, Board meeting, July 2004
 Macro and micro organizational structures
 Board Nominations
 First- and second-line manager nominations
 P&L Project – A first draft of internal transfer prices between business areas, March 2003
 P&L Project – Overview and final outcomes, Board meeting, September 2003
 PCO plan for the development of the P&L and KPI projects, Kick-off meeting, January 2003
 Strategic Information Systems plan for a 3-year-period

Appendix C. Interviews with the PCO managers

Date	Position	Length (minute) approximate
May 2003	First-line manager	90
July 2003	Second-line manager	165
December 2003	First-line manager	165
December 2004	First-line manager	75
December 2004	Second-line manager	150
September 2005	Second-line manager	105
September 2005	Second-line manager	180
February 2006	Second-line manager	90

Appendix D. Interviews with Post managers from seven different organizational areas

Date	Organizational area	Position	Length (minutes) approximate
June 2003	Operations	First-line manager	150
July 2003	Commercial	First-line manager	150
July 2003	Quality and Development	Second-line manager	150
July 2003	Marketing	First-line manager	135
July 2003	Marketing	First-line manager	45
December 2003	Quality and Development	First-line manager	150
December 2003	Finance	Second-line manager	120
January 2004	Information Technology	Second-line manager	150
January 2004	Human Resources	First-line manager	105
November 2004	Operations	First-line manager	90
December 2004	Information Technology	Second-line manager	135
January 2005	Human Resources	Second-line manager	120
January 2005	Operations	Second-line manager	135
January 2005	Commercial	Second-line manager	135

Appendix E. Interview guideline*I – Concerning the Post's organizational context*

1. Description of the current and previous interviewees' work and of their department work.
2. Presentation of the company (main products/services provided, historical background, current and previous organizational structures, main strategic policies, etc.).
3. What are the main challenges that Post has faced recently?
4. How do Post managers see the future of the company?
5. Description of its present information systems, including the P&L and KPI.
6. Strengths and weaknesses of the AIS as perceived by Post managers.
7. Besides the AIS, what other changes have occurred in Post?

II– Concerning the reasons for the decision to adopt the P&L and KPI

1. When did Post decide to adopt the P&L and KPI?
2. What were the reasons that led Post to adopt the P&L and KPI?
3. Who was behind the adoption of the P&L and KPI (any particular manager/department)?
4. What were the reasons presented by this (these) particular person (people) to adopt them?
5. What was the role of the Board of Directors towards the adoption of the P&L and KPI?
6. How did Post managers react to the adoption of the P&L and KPI? Have you felt any resistance to the adoption of these systems?

III – Concerning the P&L and KPI implementation processes

1. What was the involvement of Post managers, including the Board members, in the P&L and KPI implementation processes?
2. How were the P&L and KPI implemented (including indicating the composition of the steering group, meeting schedule, duration of the meetings, etc.)?
3. How long were the P&L and KPI implementation processes?
4. What were the strengths and weaknesses of the P&L and KPI implementation processes?
5. What was the role of the PCO managers in the P&L and KPI implementation processes? How did they interact with the other Post managers and departments?
6. What was the role of the managers from the other Post departments in the P&L and KPI implementation processes? How did they interact with the PCO and other Post managers?
7. What was the role of the Board of Directors in the P&L and KPI implementation processes?
8. How do you assess the overall P&L and KPI implementation processes?

Appendix F. KPI project: Post's strategic objectives organized into four perspectives

Perspectives	Post's strategic objectives (corporate level)
Financial	<ul style="list-style-type: none"> • Sales growth • Profitability growth • Return on investments • Value added (Cash value added)
Market/customer	<ul style="list-style-type: none"> • Customer satisfaction • Market share growth
Resources	<ul style="list-style-type: none"> • Increased resource efficiency • Reduction of costs • Development of human resource skills • Increased team-working synergies
Processes/service quality	<ul style="list-style-type: none"> • Increased efficiency in administrative processes • Increased efficiency in customer relationship management • Increased productivity • Achievement of service quality standards

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