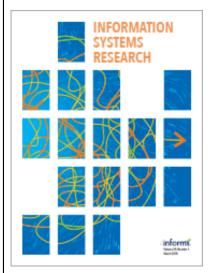
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Identity Work in Interdependent Professional Groups: The Role of a Target Identity in Enterprise Systems Implementation

Johann Dietz,^a Kai Spohrer,^{b,*} Hartmut Hoehle^a

^aDepartment of Enterprise Systems, Business School, University of Mannheim, 68131 Mannheim, Germany; ^bManagement Department, Frankfurt School of Finance & Management, 60322 Frankfurt am Main, Germany

*Corresponding author

Contact: johann.dietz@sap.com (JD); k.spohrer@fs.de, 🕞 https://orcid.org/0000-0001-8659-7554 (KS); hoehle@uni-mannheim.de, https://orcid.org/0000-0001-8117-0105 (HH)

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Abstract. Enterprise systems (ESs) can be important for the development and maintenance of professional role identities. Prior work shows that a new ES implementation can trigger significant identity work in individuals and groups if it alters their tasks or responsibilities. What has received less attention is that the introduction of a new ES may affect multiple, interdependent professional groups simultaneously, changing how these professional groups can or must interact based on the system properties. Consequently, the introduction of a new ES may also affect how these groups maintain distinctive professional role identities. This study examines how the introduction of a new ES affects the identity work of interdependent professional groups in an organization. Drawing on a revelatory context, we studied the identity work of management accountants and financial accountants in six cases where a new ES merged traditionally separate financial and management accounting modules into one general accounting module. To understand the emergent identity work, we present the construct of a target identity (i.e., a tentative enhanced professional role identity that professional groups actively strive to achieve) and describe three patterns of identity work. We derive five propositions about the conditions under which interdependent professional groups develop a target identity, about the consequences of (not) achieving a target identity, and about the willingness of interdependent professional groups to renegotiate their role boundaries.

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Keywords: enterprise systems • module merger • identity work • ERP system • professional role identity • identity • professions • work groups • accounting • interdependencies

Introduction

Newly implemented enterprise systems (ESs) often impose process changes and reduce the discretion that user groups have in organizational tasks (Alvarez 2008, Mishra et al. 2012). In doing so, ESs often redistribute responsibilities between different professional groups. For example, when implementing standard ESs, such as enterprise resource planning (ERP) software, organizations usually adopt process templates and role definitions according to the prescriptions and recommendations of ES vendors. Clear-cut and long-established divisions of work between professional groups in an organization may be blurred, altered, or completely redefined during ES implementation projects (Lapointe and Rivard 2005). The implementation of a new ES, therefore, triggers many professional groups to re-evaluate their professional

role identity in light of how the ES changes the way they work together with others. Professional role identity refers to the internalized beliefs that members of a professional group hold about their role in an organization. It provides answers to the two questions of "Who are we?" and "What do we do?" in an organizational context (Reay et al. 2017). The answer to these questions is inextricably related to the questions of how professionals use ESs to fulfill their organizational tasks and how they work together with other professional groups.

Some professional groups perceive the changes during an ES implementation and their potential effects on professional role identities as an opportunity for development (Petriglieri 2011). For example, nurses may feel empowered and develop new ideas on how to do their jobs better when gaining access to electronic health

records (Lapointe and Rivard 2005). Other professional groups, however, may feel that an ES poses a threat to core aspects of who they are and what they do as professionals (Pratt et al. 2006, Venkatesh et al. 2011, Craig et al. 2019, Jussupow et al. 2022a). Those employees become unsure about how to behave in their roles, exhibit resistance to the new ES, or even work against other professional groups that they believe are benefiting from the ES at their expense (Lapointe and Rivard 2005). Such effects can disturb collaboration and coordination across an entire organization (Alvarez 2008). Thus, managers who want to effectively implement new ESs must understand why interdependent professional groups in their organization assess a new ES as a threat or as a development opportunity, how this assessment changes the interactions between professional groups, and how they can facilitate development opportunities for as many professional groups as possible.

Research shows that professionals who are faced with change in their jobs engage in identity work (i.e., the process of constructing, maintaining, and modifying one's sense of self as a member of a professional group in an organization) (Pratt et al. 2006). Extant research on information system (IS) and professional groups emphasizes that professionals react to feelings of inconsistency between their sense of who they are and their sense of what they do in their organization by adapting themselves or their work processes, aiming to maintain congruence in their professional role identity (Boudreau et al. 2014, Nelson and Irwin 2014, Craig et al. 2019, Strich et al. 2021). For example, some studies show how ES users engage in work-arounds and resist ES implementations in order to prevent loss of control and retain work activities that they consider central to their professional role (Lapointe and Rivard 2005, Alvarez 2008, Craig et al. 2019). More generally, users are found to exhibit identity protection or identity restructuring responses if they feel that a new information technology (IT) threatens their professional role identity by automating or changing key tasks in their work (Pratt et al. 2006, Petriglieri 2011). Other studies show how professional groups, such as librarians or loan consultants, successively adapted their professional role identities to leverage powerful new IT for organizational tasks (Boudreau et al. 2014, Nelson and Irwin 2014, Strich et al. 2021). A common theme in this line of work is that the studies look at professional groups engaging with IT that reposition who they are by altering what they do. However, these studies do not look at interdependent professional groups or how ESs influence the relationship between such interdependent professional groups. What research on professional role identity has largely overlooked is that complex new ESs rarely change isolated tasks and responsibilities of only one professional group. Instead, the introduction of a new ES typically affects multiple professional groups at the same time.

From a theoretical perspective, we lack a detailed understanding of the identity work that interdependent professional groups in an organization engage in if a new ES is introduced that may alter their interdependencies. This is unfortunate because role identities are inherently relational, and many roles only make sense in relation to others (Sluss and Ashforth 2007, Burke and Stets 2022). It is unclear how role identities of interdependent professional groups are maintained if some groups may develop and pursue enhanced professional role identities, whereas others may protect their established role identities. Macro-level studies suggest that global occupational groups engage in extensive identity work to define their own occupation as both sufficiently distinct from and sufficiently similar to other occupations (Vaast and Pinsonneault 2021). Whether and how interdependent professional groups in organizations also strive for such distinctiveness remains unclear. These shortcomings limit our ability to extend and refine existing theories of professional role identity and intergroup relations. Addressing this gap would allow scholars to develop more nuanced models that account for the dynamic and relational nature of professional role identities in the context of technological change. A deeper understanding of the identity work of interdependent professional groups facing new ESs could also provide new insights into how identity work influences the successful adoption and integration of new ESs within organizations. Thus, research must pay attention to the interdependencies of professional groups in order to understand how they develop and maintain their professional role identities in light of new ESs.

Against this backdrop, we aim to answer the following research question. How does the introduction of an ES influence the identity work of interdependent professional groups?

To address this question, we conducted a revelatory multiple case study (Yin 1994) in a context that is particularly fitting to study the relational character of professional role identities in ES implementation. Specifically, we examine the identity work of financial accountants and management accountants in the implementation of one of the world's most widely used ERP systems. In the newest version of this ERP system, the previously decoupled modules for financial and management accounting have been merged into a single accounting module, thereby altering the interdependencies between these professional groups. Six cases helped us to examine ES-related changes in professional role identity over time. We present three patterns of identity work in these interdependent professional groups that were faced with a new ES. We contribute to the IS literature in two major ways. First, we conceptualize and explain a new construct, target identity, defined as a tentative enhanced professional role identity that professional groups actively strive to achieve. This construct facilitates a more

nuanced understanding of the impact of ES-triggered changes on the role identity of professional groups. Second, we provide testable propositions about the impact of an ES implementation on the identity work of interdependent professional groups. Specifically, we provide propositions about the conditions under which interdependent professional groups develop a target identity, about the consequences of (not) achieving a target identity, and about the willingness of interdependent professional groups to renegotiate their role boundaries. Our research also enables managers to better address interdependent professional groups during ES implementation by monitoring the development of target identities and by initiating ES-directed bridging practices that foster mutual understanding between the groups.

Theoretical Foundations

Through education and socialization, professionals develop a strong attachment to their work roles that allow them to define themselves with respect to values, goals, norms, and ways of interacting with others (Cardador and Pratt 2018). Professional role identity can be examined at individual and collective levels of analysis. At an individual level, prior work studied how individual employees develop their role identity over time as they are trained and settle into new roles: for example, progressing from medical students to medical practitioners (Ibarra 1999, Pratt et al. 2006). Drawing primarily on identity theory (Burke and Stets 2022), this line of research shows that individuals hold multiple, hierarchically organized identities at the same time and that they aim to maintain congruence between what they do in their role and how they identify themselves. Work changes, therefore, trigger identity work in individuals. By adapting their identity as well as how they perform their organizational tasks, individuals faced with work changes aim to align their perceptions of what they do and who they are as professionals (Kyratsis et al. 2017). Focusing on the entanglement of identity and material IS artifacts, this line of research has developed the construct IT identity defined as the strength of individuals' self-identification with a specific IT (Carter and Grover 2015; Carter et al. 2020a, b).

At a collective level, professionals develop a social identity that delimits which abstract goals they strive to achieve (i.e., who they are) and what activities and tasks they perceive as core to their role in an organization (i.e., what they do) (Boudreau et al. 2014, Strich et al. 2021). In addition to the pursuit of congruency between what they do and who they are, professional groups strive to maintain the distinctiveness of their professional role identity from that of other related professional groups (Nelson and Irwin 2014, Vaast and Pinsonneault 2021). In particular, studies drawing on social identity theory (Tajfel and Turner 1986) have emphasized that professionals

who identify with one professional role often hold less favorable or even negative views of other professional groups, leading to a categorization of insiders versus outsiders and "us versus them" (Cardador and Pratt 2018). Investigating the identity work of interdependent professional groups, this study is concerned with the collective level of professional role identity.

Technological Change and Identity Work

Professional role identity is a crucial determinant of professionals' perception of technological change in their work environment (Mishra et al. 2012, Craig et al. 2019, Strich et al. 2021). Professionals highly value their role identity, making it resilient to change (Pratt et al. 2006, Reay et al. 2017). Prior work suggests that professionals generally feel that technology altering their work processes either threatens their professional role identity or provides an opportunity for enhancing their professional role identity (Mishra et al. 2012).

Especially in the ES context, most studies have focused on identity threats and identity threat coping responses. Identity threat coping responses are triggered when external circumstances challenge a relevant identity (Petriglieri 2011). Studies have shown that identity threats from technology can trigger emotional responses, such as frustration, anger, and worry (Nach and Lejeune 2010). Moreover, professional groups often cope with identity threats from ES by not using the ES or by using it in unintended ways (e.g., Lapointe and Rivard 2005; Alvarez 2008; Stein et al. 2013; Craig et al. 2019; Jussupow et al. 2022a, b). The reasons for perceived identity threats from ES are often technologyinduced changes to key work processes of professional groups that make the groups' resources less valuable and reduce their autonomy. For example, physicians have been observed to perceive identity threats from ES that reduce the need for scientific expertise (Lamb and Davidson 2005), limit their free choice in therapy (Chreim et al. 2007), enable evaluation by peers and patients (Kyratsis et al. 2017), or provide more power to other professional groups (Lapointe and Rivard 2005). More generally, professional groups exhibit *identity pro*tection responses to protect their existing professional role identity by attacking an ES as the source of the identity threat, resisting its implementation, using it in unintended ways, or discrediting it (Petriglieri 2011).

A second way of coping with perceived threats to professional role identity is *identity restructuring* (Bernardi et al. 2019). Identity restructuring refers to changing a threatened identity by reinterpreting it in terms of importance (Kreiner et al. 2009) or meaning (Holmes et al. 2016) or by abandoning it altogether (Petriglieri 2011). For example, Boudreau et al. (2014) and Nelson and Irwin (2014) examined how librarians reacted to identity threats they perceived when internet search engines became popular and started to outperform

librarians in their core task of finding literature. The authors show that, over time, librarians adopted a new professional role identity that effectively integrated the technology into their core work activities, relying "less on information searching, cataloging, and storage, and instead emphasized connecting people and resources to one another" (Nelson and Irwin 2014, p. 915). Recently, Strich et al. (2021) examined how loan consultants and service employees adapted their professional role identity in light of a new ES that applied artificial intelligence to automate decision-making tasks that the professionals regarded as core to their roles. The authors show that by employing both identity protection responses and identity restructuring responses, the professionals developed new professional role identities that drew strongly on the use of the ES in their core work activities. Thus, ES can trigger different kinds of identity work, which can result in resistance, minor changes to extant professional role identities, or even the emergence of new professional role identities.

Identity Work of Interdependent Professional Groups

What is less clear is how and under which conditions some professional groups successfully develop new or enhanced professional role identities when faced with IT, whereas others cling to their extant identities (Boudreau et al. 2014). Few studies have spoken to this question. At an individual level, Pratt et al. (2006) suggest that minor changes in work processes are likely to trigger identity enrichment (i.e., the development of a deeper and more nuanced understanding of one's existing professional role identity), whereas major changes in work processes tend to yield new identities that are based on altered beliefs about one's work, goals, and values (Pratt et al. 2006). Ibarra (1999) suggests that individuals develop and experiment with numerous "provisional selves" that serve as trials for possible but not yet elaborated identities. Likewise, Clark et al. (2010) suggest that growing organizations try out loosely defined "transitional identities" to experiment and evaluate what is possible in their organizational environment. At the level of professional groups, Boudreau et al. (2014) propose the concept of provisional role identities (i.e., trial identities that professional groups experiment with tentatively until they develop a new professional role identity).

All of these concepts have in common that they represent the idea of a tentative identity to which professionals have little attachment and that can be abandoned without major challenges. Boudreau et al. (2014) suggest that provisional identities are constructed from professionals' previous identity (i.e., "who we were") and the numerous possibilities that professionals see in their potential futures (i.e., "who we could be"). Prior work thereby assumes that the development of a

provisional identity is a relatively random process and that professionals do not attach much meaning to their provisional identities because these identities merely serve to try out and evaluate possibilities. In doing so, prior work does not explain how and under which conditions some professional groups develop and vigorously pursue provisional identities, whereas other groups retain and protect their established professional role identities.

Especially in the context of newly introduced ES, interdependencies between professional groups are an arguably important factor related to this kind of identity work. However, interdependencies between professional groups have not received much attention in prior research on professional role identity and IT. This is surprising because professional role identity is shaped not only by professionals' own work but also, by their relationships with other professionals in similar settings (Chreim et al. 2007, Sluss and Ashforth 2007). Specifically, a professional role identity necessarily contains elements of how role occupants enact their role vis-à-vis other related roles (Sluss and Ashforth 2007), and some professional role identities only make sense in relation to others. For example, the meaning of "leader" in an organization is shaped by interactions with "followers" (Cardador and Pratt 2018). Some prior work suggests that professional groups aim to develop identities that are clearly distinctive from other professional groups (Vaast and Pinsonneault 2021). Regarding the distinctiveness of professional role identities, identity work may be particularly influenced by groups that are somewhat similar to one's own professional group (Vaast and Pinsonneault 2021). As Carter and Grover (2015) put it, "asking 'Who am I?' necessarily involves the question, 'Who am I not?'" (Carter and Grover 2015, p. 938).

Few prior studies have looked at multiple professional groups and their identity work in relation to IT. Boudreau et al. (2014) suggest that organizational stakeholders can influence the identity work of professional groups. For example, Boudreau et al. (2014) show that disparities between how librarians saw their own role and how relevant other organizational stakeholders saw the librarians' role led to perceptions of identity threat and resulted in identity work to find and communicate a more consistent professional role identity. Several studies have suggested that intergroup conflict can be a source of identity threat during ES implementation projects if one professional group fears status loss compared with other professional groups in an organization (e.g., Lapointe and Rivard 2005, Craig et al. 2019). Recently, Strich et al. (2021) showed that two originally distinct professional groups in an organization can end up with very similar professional role identities if a new ES forces them to follow the same processes and conduct similar work tasks. Interestingly, Strich et al. (2021) also showed that these professional groups can exhibit very different levels of satisfaction with the convergence of their professional role identities (Strich et al. 2021).

Although very valuable, these studies have all looked at relatively independent professional groups in organizations. None of these studies focused on the identity work that happens in interdependent professional groups if a new ES alters their work processes so that there are changes in how the tasks of each professional group depend on tasks completed by the other. Moreover, the vast majority of prior studies on professional role identity and ES implementation with multiple professional groups have investigated the identity work within one organization, thus reducing possibilities for comparisons across contexts. Although insights from those prior studies suggest that significant identity work may be triggered if an ES affects the interdependence of professional groups' work processes, the exact consequences are unclear. On the one hand, if the new ES increases dependencies between the professional groups or creates overlapping activities, each group may perceive the new ES as threatening the distinctiveness of their role in the company. On the other hand, new ES-enforced activities with more or less dependencies between the professional groups' work processes may allow them to achieve a more efficient division of work and help them to redefine their roles according to their ideals. Thus, this issue warrants closer examination.

Methodology Research Context

Our case study approach is revelatory (Yin 1994) because we rely on a particularly suitable opportunity for studying the identity work of interdependent professional groups during ES implementation. Specifically, we study the identity work of financial accountants and management accountants in the implementation of one of the world's most widely used ERP systems, namely SAP S/4HANA. This is a revelatory context for studying the influence of ESs on interdependent professional groups because S/4HANA features a module merger of previously decoupled finance (FI) and controlling (CO) modules. In previous versions of this ERP system, the FI module facilitated the processing of financial accounting tasks (i.e., the generation and supervision of financial statements, including balance sheets, income statements, and cash flows, mainly for the provision of information to investors, creditors, regulators, tax authorities, and other external stakeholders) (Richardson 2017). In contrast, the CO module supported the fulfillment of management accounting responsibilities (i.e., cost tracking and budget preparation activities that primarily support management's decision making) (Grabski et al. 2009). The newest version of this ERP system merges those modules and stores all management and financial accounting transactions in a central

accounting table (Stuetz 2017). Practitioners agree that this module merger has initiated a radical change in the daily working routines of financial and management accountants because it connects traditionally independent types of accounting activities (Simon 2017, Walz et al. 2017).

From an identity perspective, the relationship between financial and management accountants in organizations is particularly interesting (see Online Appendix A.1 for details) because there have been occupational identity tensions between management accountants and financial accountants (Richardson 2002). In fact, management accountants have long felt dominated by financial accounting and have only recently begun to regard their careers as independent from financial accounting (Richardson and Jones 2007, Richardson 2017). Already early IS studies describe resistance to ES implementations rooted in power struggles between financial and management accountants (Markus 1983). Today, management accountants regard the usage and analysis of ES data as "the classic domain of management accounting" (Mahlendorf et al. 2023, p. 551). Hence, in blurring the clear separation of financial accounting and management accounting, the new ES with merged accounting modules has the potential to disrupt the professional identity of the two professional groups with unclear consequences.

Sampling and Data Collection

We followed the approach of Eisenhardt (1989) (see Online Appendix A.2 for the steps of our research method) to understand the identity work of financial accountants and management accountants in light of this new ES. Within a total of six cases (A–F), we relied on interviews, project documentation, and presentations as data sources. We sampled our cases in a multistep process following a theoretical sampling logic as per Eisenhardt (1989). As the first author had a five-year engagement with the ES vendor, project managers and consultants helped us in a first step to compile a list of large ES implementation projects that encompassed the merged accounting module. We focused on large multinational companies and independent business units of such companies headquartered in Europe because such organizations traditionally separate financial and management accounting (Richardson 2017). In a second step, we acquired more information about the listed projects. To tap into the revelatory context of merged modules, we filtered for projects where the organization had deployed an ES by the same vendor for their financial and management accounting functions prior to SAP S/4HANA. All remaining list entries had introduced SAP S/4HANA in a time range of up to four years prior to our study. Hence, all of them shared a similar implementation history, deployment model, and software usage plan. In a next step, we started data collection and analysis. We first sampled two cases, aiming to initially

look at contexts that shared a lot of background so that we might more easily discern developments related to the ES implementation. Cases E and F were drawn from two large and loosely coupled business units of one large multinational company. We assumed that organizational culture might be similar in these two cases, so it should not lead to major differences in identity work. The cases were both large enough (significantly more than 500 employees) and independent enough (distinct business units with own management teams) to have separate ES implementation projects, thereby allowing for unique insights. As we engaged in the first data collection and analysis steps, we realized that a key element of our emerging theory related to how financial and management accountants renegotiated their role boundaries to establish new divisions of work. We aimed to investigate this more deeply and sampled two cases (C and D), of which consultants reported that changes in the division of work were abundant. Finally, as the target identity construct emerged from ongoing analyses, we sampled two more cases that were still close to their shakedown phase (A and B) to help us better understand the target identity development during this phase.

We conducted 40 semistructured interviews from May 2019 to November 2020. These included 26 interviews conducted with financial and management accountants in cases A, B, C, D, E, and F. In addition to studying the six cases, we used our close relationships with project managers and consultants to gather the perspective of the ES vendor on the impact of the ES on financial and management accountants through 14 interviews with consultants. A predetermined part of all interviews was thematically subdivided into three sections, covering questions regarding (1) the perception and evaluation of the interaction of financial and management accountants in the scope of the ES implementation, (2) the changes caused by the ES, and (3) how the respondents perceived these changes. The predetermined topics ensured comparability within and across cases while providing the interviewees enough room to introduce new ideas (Myers and Newman 2007). In addition to interviews, we reviewed 722 pages of relevant project documentation and presentations that allowed us detailed insights into implementation project setups, project states, and documented concerns. The interviews with consultants as well as informal talks with the ES vendor helped us to adjust the structured part of our interviews and constantly discuss our results and their implications for practice. All interviews were recorded and transcribed, leading to 448 pages of interview transcripts. To ensure that all case-related data were well organized, they were stored in a case study database using NVivo 12. Table 1 provides a brief summary of the cases and the data collected.

Data Analysis

We constantly iterated between data gathering and analysis, and we applied inductive coding procedures, specifically open, axial, and selective coding (Strauss and Corbin 1990). The open coding process uncovered concepts relevant to describing the impact of the ES module merger on the professional groups' identity work. Using axial coding, we identified similarities and differences between the cases, resulting in three patterns that differed in how management and financial accountants interacted over time. We extracted the core categories that distinguished the three identified patterns. In Figure 1, where we display our data structure, they are labeled second-order themes. The mapping of open, axial, and selective coding to concepts, themes, and dimensions follows the approach outlined by Gioia et al. (2013). Online Appendix A.3 contains exemplary codes.

At the beginning of each analysis iteration, we read the transcripts and openly coded every sentence related to the ES. In doing so, we realized that the interviewees often described the ES as altering the relationship between the financial and management accounting departments. We recognized and noted these new open codes and applied them in subsequent iterations. Next, we reviewed project documentation and presentations to complement the descriptions of the interviewees and to perform triangulation. Thereafter, we grouped all conceptually similar open codes to obtain higher-level concepts (first-order concepts). We used axial coding to review all identified concepts and grouped them according to enabling conditions. This process, which was supported by memo writing and tables (Miles and Huberman 1994), revealed three patterns of identity work in financial and management accountants. Each case exposed pattern 1 and either pattern 2 or pattern 3. We describe these patterns in detail in the Findings section below. Next, leveraging selective coding, we identified the mechanisms underlying the impact of ES implementations on the identity work of interdependent professional groups (Strauss and Corbin 1990). This last analytical step required memos, case writeups, and visual mapping. Online Appendix A.4 provides an example of how we used visual mapping (Miles and Huberman 1994) to analyze the differences between cases exhibiting patterns 1, 2, and 3.

Our coding process revealed four aggregate dimensions that we identified as key aspects underlying the different patterns. Drawing on these concepts, we iteratively developed and refined both verbal and visual explanations of the causal mechanisms we believed were at play in the three patterns that differentiated the cases. In the process, we consulted theory and research on identity work and constantly iterated between crafting our mechanisms bottom up and sharpening them with extant theoretical views top down. We discussed all variants extensively in the team of authors and

Table 1. Cases and Data

Case	Rollout	Industry	Interviews		Documents and presentations	
			Туре	No.	Туре	No.
A	7 months before	Operates in life sciences	MA	2	Company information	29
		•	FA	2	Press articles	7
В	7 months before	Operates in the retail industry	MA	2	Company information	31
		ı ,	FA	2	Lessons learned	4
					Press articles	6
С	10 months before	Operates in the transportation industry	MA	3	Company information	36
					Project objectives and plans	45
		,	FA	1	Lessons learned	5
					Press articles	6
D	40 months before	Operates in the manufacturing	MA	1	Company information	31
		industry			Project objectives and plans	34
		,	FA	3	KPI variations	3
					Press articles	6
E	48 months before	Operates in the high-tech	MA	3	Company information	37
		industry; E and F were embedded in distinct and	FA	1	Board area information (2 pages for each board area)	4
F	48 months before	loosely coupled business	MA	4	Project objectives and plans	45
		units of one multinational	FA	2	Lessons learned	74
		company			Press articles	7
ES vendor		Consultants who guided	CO	7	S/4HANA finance training documents	312
		numerous ES	FI	7	,	
		implementations and				
		specialized either in				
		management (CO) or				
		financial accounting (FI)				
Overall				40		722

Note. FA, financial accountant; KPI, key performance indicators; MA, management accountant.

engaged in member checking with consultants who had helped in sampling the cases. Finally, this process resulted in five propositions as displayed in the section Analytical Abstraction: Identity Work of Interdependent Professional Groups with New ES.

Findings

In the following, we describe three patterns of identity work of financial and management accountants that we observed as these professional groups reacted to the new ES with merged modules for financial and management accounting. Figure 2 illustrates these patterns. Pattern 1 was found in all cases and happened during the shakedown phase of the ES implementation projects. Patterns 2 and 3 happened after the shakedown phase. Each case exposed pattern 1 and either pattern 2 or pattern 3. Thus, there is a temporal sequence between the patterns. Subsequently, we describe the patterns and draw on them to derive theoretical propositions about the identity work of interdependent professional groups in the implementation of new ES.

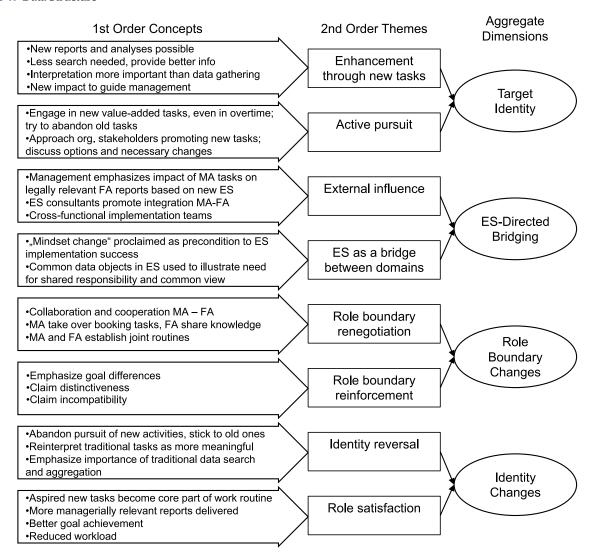
Pattern 1: Experience-Driven Development of a Target Identity

The first pattern illuminates the impact of the new ES with merged accounting modules on financial and management accountants in the early phases of the

implementation projects. At this point in time, the professional groups developed a sense of the improved ES capabilities and evaluated whether the system enabled them to target a new, enhanced professional role identity. At this stage, management accountants developed a target identity, whereas financial accountants did not see relevant changes to their work processes that would have influenced their professional role identity. The accountants also realized that the module merger created new interdependencies in their work processes. Particularly, management accountants became more dependent on information and tasks residing with financial accountants. Pattern 1 was most easily observable in cases A, B, and C, where the system rollout had happened less than one year before the data collection.

Throughout the implementation projects, both financial and management accountants tested the new system to get used to it. The professional groups used this opportunity to identify and mitigate potential obstacles to a smooth migration. Although the professionals considered these testing activities to be sufficient, they knew that not all problems could be resolved prior to the rollout. As anticipated, some differences compared with the legacy systems only became apparent after the go-live point. Hence, at run time of the new system, the employees needed to familiarize themselves with new functionalities and intricacies. Given its temporal

Figure 1. Data Structure



Note. FA, financial accountant; MA, management accountant.

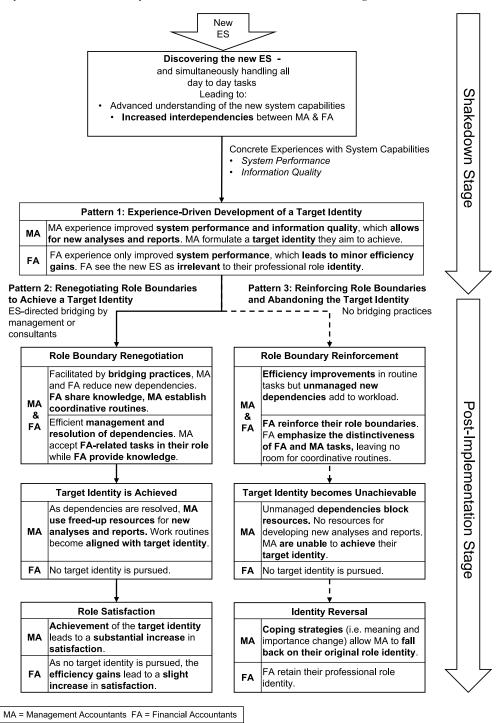
position, early after the ES rollout, we call this phase the shakedown phase. Throughout this period of discovering the new ES, both professional groups also had to process all of their day-to-day tasks. Therefore, both financial and management accountants had to deal with an increase in workload, especially because new interdependencies within the system were not completely known and caused a need for extra work.

I mean, our SAP [system] and the [finance and controlling] modules, that's all quite entangled. There are things that I cannot complete on the finance side if the respective steps in controlling have not been taken. And vice versa, I am sure the [management accounting] colleagues will tell you. —Financial accountant (Case B)

You have to think about the process: How do I figure this out? This means that currently I don't have any time savings. I emphasize "now," as that will hopefully improve over time. —Financial accountant (Case A)

Once the professional groups discovered more functionalities of the new ES, they started to have concrete experiences with new system capabilities. Financial accountants and management accountants came to value the improved system performance of the ES that provided all accounting data in one easily accessible table readily and without delays. In their previous ES, management and financial accountants had to invest a significant amount of resources to ensure the consistency of multiple data sources and to find the information they needed for creating reports and analyses. The new ES provided a simplified and quicker way to do so. Thus, increased system performance was perceived as beneficial across all cases and professional groups.

Figure 2. Summary of Patters—The Identity Work of Financial Accountants and Management Accountants with a New ES



I don't have to look in 20 tables anymore, I can look in one and this one is fast. Yes, I am at the point that I hardly run reports anymore. ... That's an extreme advantage. The miracle-transaction is called SE16H and if you know it then you don't need much else, so to say. —Management accountant (Case E)

Things I needed to adjust twice and three times in different applications, those are now definitely simpler. Because I only have one application left where I maintain everything. —Financial accountant (Case F)

Both management and financial accountants anticipated that once all transactions and functionalities of

the new system would be understood, the improved system performance would result in reduced workload. Beyond questions of workload, financial accountants perceived that the information that they had at their fingertips had not substantially changed, although higher system performance made it more readily available.

In contrast, management accountants experienced not only better system performance but also, a significant increase in information quality. Across all cases, management accountants experienced that the new ES made it technically possible to improve the quantity and quality of their analyses, enabling them to provide completely new kinds of insight. They anticipated that the new reports and analyses would help them to understand the business areas of their organizations more thoroughly and to support their top management better in the decision-making process.

It has to go more in that direction, data has to be available, data has to be correct, data has to be reliable, ideally it has to be available in real time and that's exactly what S/4 wants to achieve. And you, as a management accountant, can then just use this and tell what the business is showing, what is actually happening! —Management accountant (Case C)

So, the ACDOCA [i.e., the common table for all financial and management accounting data in the new ES] really allows you to jump from reporting on this database back to the account or the document. You can have a look at the transaction, check on what account it was posted. Then you jump to this account, have a look at what documents had been posted to this account, and you will see what cost center is associated with this transaction. By working on this common data structure, you can really see a transaction from the beginning to the end. —Management accountant (Case F)

In making the direct experience that they could perform new, highly valuable tasks, the management accountants began to frame these new tasks as "proper" and "actual management accounting." Triggered by the direct experiences with the new ES, the management

accountants developed a target identity (i.e., an enhanced tentative identity that they actively aimed to achieve in the scope of the ES implementation). This target identity (see Figure 3) retained the core understanding of who they were ("management accountants, supporters of management decisions") but featured an altered understanding of their core work activities. Whereas the "what we do" of their traditional professional role identity emphasized gathering and providing correct numbers, the target identity aimed for activities to interpret information from different business areas on a larger scale and with more impact on top management. Consequently, these management accountants planned to leverage the module merger to fundamentally shift the focus of their work activities toward more significant and challenging tasks in line with this target identity.

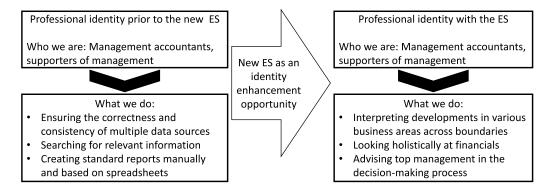
In the past we used Excel quite often and with all the different books we dealt relatively long with the distinct origins of the data. What we'll have to do in the future: ... we'll be dealing more with actual management accounting. And that's the absolute goal. ... To go properly into the calculations, to go properly into the production orders, to check my planned costs and standard cost, to check where I have deviations from the plan, to better analyze my stock levels and, and, and ... So just management accounting, the actual management accounting. —Management accountant (Case A)

Financial accountants, by contrast, did not develop a target identity as they did not have any concrete experience with new tasks or significantly different work processes; they merely expected a slight decrease in workload.

I mean ... What we do has not changed. Thanks to the system and the integration you have a few new ways to complete your tasks, so to say. —Financial accountant (Case A)

In summary, both professional groups perceived an increase in workload during the shakedown stage

Figure 3. The Target Identity of Management Accountants



because they needed to learn the new system while handling day-to-day tasks and facing new interdependencies rooted in the shared accounting database. Although financial accountants only benefitted from an increase in system performance, they did not expect additional impacts on their work processes from the ES. In contrast, management accountants gained concrete experiences with the ES that showed them that entirely new kinds of reports and analyses became technically feasible because of improved information quality. Management accountants perceived these analytical tasks as "real" or "proper" management accounting and formulated a new target identity they aimed to achieve. In addition, both professional groups noticed soon after the implementation that the joint data structure of the merged ES modules was increasing the task interdependence between financial and management accounting.

Interdependencies Become Increasingly Challenging

Over time, the interdependencies created by the new ES became more and more apparent. Both professional groups realized that work processes, which had previously been the exclusive responsibility of one group, now affected both groups. Especially as management accountants tried to use the new ES for more complex analyses in line with their target identity, they noted that they were often dependent on financial accountants. For example, management accountants were not able to alter or add bookings anymore once financial accountants started their period-end closing procedure. Additionally, management accountants were always dependent on financial accountants when dealing with master data, which interfered with work processes that they traditionally regarded as core to their professional role identity.

In the past, we used to create our cost elements the way we needed them. Which means there was no need to coordinate with our financial accounting colleagues. ... Even for topics that are purely management accounting, topics that don't come up in the legal [i.e., financial] reports at all, we need to coordinate now because [financial] accounting obviously rules over all accounts. —Management accountant (Case F)

In the financial and management accounting areas, we have an extremely large number of interconnections when it comes to settlements, account controls, and all kind of things. ... Of course, now we need to communicate more with each other. —Management accountant (Case A)

Financial accountants realized that there were more dependencies, but they were less affected by those dependencies in tasks that they perceived as crucial to their own role. Thus, financial accountants acknowledged that

the new ES had a greater impact on management accountants than on their own professional group.

It was not a big change for us. But I know that the change in management accounting was much greater. On the financial accounting side, we could continue almost as before. —Financial accountant (Case D)

Pattern 2: Renegotiating Role Boundaries to Achieve a Target Identity

The second pattern describes the identity work of management and financial accountants in settings where consultants and managers used the ES implementation to bridge between management and financial accountants. Although emergent interdependencies between the professional groups were becoming increasingly challenging, the professional groups in this pattern all benefitted from the ES implementation. Management accountants and financial accountants in this pattern renegotiated their role boundaries to establish effective coordination across the groups. For example, management accountants adopted booking tasks from financial accountants, whereas financial accountants established routines for knowledge sharing and communication with management accountants. As the interdependencies were gradually managed or even resolved, management accountants became able to achieve their target identity, and financial accountants experienced a reduction in workload. Ultimately, the professional groups in this pattern became more satisfied with their profes-

A key characteristic of this pattern is that managers, ES implementation consultants, and implementation project teams aimed at—and succeeded in—"bridging" between management and financial accountants. Bridging practices spanned the boundary between the two professional groups and helped them to mutually understand and appreciate their challenges regarding the ES implementation. Bridging practices included the provision of information on how the ES usage of one professional group might affect the other, guidance on how to understand shared processes in the ES, and high-level recommendations on how to interact. The bridging practices helped both professional groups to develop a sense of shared responsibility for correct and effective accounting using the new ES and allowed them to investigate ways that work processes could be changed to make both groups' work with the new ES more effective. For example, some leading managers who were spearheading the ES implementation repeatedly emphasized the fact that basics should be treated equally in both professional groups.

In my company, the principle has always been that internal and external accounting should be the same. Although there are separate departments for financial and management accounting, a receipt should always be booked equally in finance and controlling. —Management accountant (Case B)

External consultants who accompanied the ES implementation emphasized that financial and management accounting groups needed to cooperate and communicate if they truly wanted to leverage benefits from the new ES.

I would say that they [financial and management accounting groups] are growing together. And not only are they growing together, they need to cooperate more. ... A management accountant likes to distribute costs to certain attributes or certain accounts by using certain mechanisms. In the past, financial accountants were not interested in this at all. This was all done in the CO module [and is now part of the merged module]. Thus, there were no coordination needs. ... If you don't want to cooperate now, of course, you can also find ways to avoid it in [the new ES]. ... But then I don't think you will get the benefits. —CO consultant (ES vendor)

During workshops and training sessions for the new ES, implementation project teams suggested that management accountants needed to refresh their knowledge of financial accounting because an increase in cooperation and communication between the groups could be expected. Moreover, they promoted soft skills.

A management accountant should possess more skills related to financial accounting than he might have had in the past. So, I'm actually assuming that someone who works in management accounting should, of course, have an understanding of financial reporting.

—Management accountant (Case F)

It becomes more difficult for a management accountant who is introverted ... The one who is sitting in the basement, processing some reports ... looking for explanations, and then sends an email—this vanishes completely. —Management accountant (Case D)

Management accountants and financial accountants in pattern 2 accepted the idea of shared responsibility that was conveyed through bridging practices. For example, ES user workshops and crossdepartmental meetings were organized in which consultants and ES implementation project teams showed the professional groups how changes in their area of the new ES affected the processes of the other professional group. Bridging practices, thus, constituted a basis for addressing the increasingly challenging interdependencies between the professional groups.

I don't think it's so much about changes to what we do. The change is rather a change of mindset. Management accountants are moving closer to legal reporting [i.e., financial accounting]. There is definitely more awareness that my work as a management accountant has legal implications [for financial reporting]. —Management accountant (Case F)

Facilitated by the ES-directed bridging practices of managers, consultants, and ES implementation teams, the management accountants and financial accountants in pattern 2 started to renegotiate their role boundaries to resolve or at least manage the interdependencies in their work processes that had been introduced by the new ES. Particularly, management accountants were keen to reduce the many task dependencies on financial accounting, which created significant workload and delays for their own tasks. In mutual agreement, management accountants adopted several task responsibilities that had traditionally resided with financial accounting: for example, regarding the management of new accounts.

We have just changed a process. We now have a template to better communicate with our financial accounting colleagues when a new account is created. All relevant contacts will be asked, "What information is relevant for you in this account?" —Management accountant (Case C)

Although these tasks added further to the workload of management accountants on the one hand, they reduced workload on the other hand as prior interdependencies between the groups were internalized into the work processes of management accountants.

Financial accountants, meanwhile, invested in new work routines to manage the increased levels of communication and created knowledge transfer channels for the management accountants.

On the side of management accounting, who we wanted to put in charge of this topic, there were few FI [financial accounting] skills. So we said, okay, we have to establish an interdepartmental expert team to cover the topic [until management accountants have acquired the knowledge]. —Financial accountant (Case F)

Although these renegotiations of who did what in the organizations were not free of conflict, they were facilitated by the ES-directed bridging practices of managers, consultants, and implementation project teams. Over time, the role boundaries and the definitions of who did what stabilized. The resulting division of work was more efficient for both professional groups.

It means that they [management and financial accountants] must at least get together. And that brings some natural conflict of interest because nobody wants to give in. ... You need to compromise. But I think this is actually better for the company and the process [than not resolving the interdependencies]. —Financial accountant (Case F)

We have been able to increase our efficiency enormously. And this naturally makes us more flexible in the processing of our tasks. —Management accountant (Case D)

In renegotiating their mutual role boundaries so that they reduced cumbersome interdependencies, management accountants and financial accountants freed up resources that they could put to other tasks. In particular, management accountants spent the time they saved in the processing of routine tasks and interdependencies on the tasks defined in their target identity.

These resources are now available for other activities [like] for the analysis—why has it come to this budget deviation, which steps do I have to take to control this budget deviation, is this budget deviation a one-time or permanent effect, how will it affect future profitability? —Management accountant (Case F)

But then you are on the right track. You are not handling lengthy administration tasks ... Instead, you are with the customer, the managing director respectively, and you can do real management accounting. —Management accountant (Case D)

Thus, actively renegotiating the boundaries of their role with financial accountants and even taking on additional work from financial accountants actually helped the management accountants in pattern 2 to ultimately achieve their target identity. In achieving their target identity, the management accountants became more satisfied with their role. Financial accountants benefitted primarily from decreased workload and did not see any major change in satisfaction.

You can prepare management better for the decision-making process. ... You have more fun, and you identify yourself more with your work. —Management accountant (Case F)

I would not say that there is a big change [in satisfaction], maybe a little better than before. —Financial accountant (Case D)

In summary, management accountants in pattern 2 achieved their target identity through a series of steps of identity work, including the renegotiation of their role boundaries with the interdependent group of financial accountants. Those renegotiations were facilitated by bridging practices of managers, ES implementation project teams, and consultants.

Pattern 3: Reinforcing Role Boundaries and Abandoning the Target Identity

Pattern 3 describes the identity work of management and financial accountants in settings without ES-directed bridging practices. Although emergent interdependencies between the professional groups were becoming increasingly challenging, the professional groups in this pattern were unable to address those interdependencies effectively. Although management accountants made attempts to coordinate with financial accountants, none of these attempts were fruitful. The emergent

interdependencies between the groups and their lack of a common identity led to identity work in both professional groups that was detrimental to coordination across role boundaries. Instead, the professional groups emphasized the distinctiveness of their existing professional role identities, leaving no room for changes or renegotiations of their role boundaries. Consequently, management accountants were unable to focus on new kinds of reports or analyses and eventually, had to cope with their failure in achieving their target identity. Management accountants in pattern 3 reverted to their original professional role identity.

Just like in pattern 2, management accountants had realized that the new ES technically enabled meaningful new kinds of analyses, which made it worthwhile for management accountants to pursue a target identity. In stark contrast to pattern 2, however, neither management nor external consultants aimed at bridging between the two professional groups of financial and management accountants.

I must say, we did not receive much in-depth training in the beginning. It was mostly about the basics of how to get our ongoing work done in [the new ES]. That integration with CO [management accounting] is a topic that we will have to address bit by bit. ... I wish we were trained a bit better, more intensively in that regard. —Financial accountant (Case A)

And that is somewhat tied to my firm strategy. Do I want FI [financial accounting] and CO [management accounting] to move closer together? And there is a company that says, no, finance and controlling are two completely distinct worlds. I assess them separately, and I want to look at them separately. —Management accountant (Case E)

Consequently, management accountants and financial accountants in pattern 3 did not develop a sense of shared responsibility but focused on their own activities instead.

At the moment, we have reached a point where the financial accountant has the pure financial accounting view, the management accountant has the pure management accounting view. —Financial accountant (Case E)

However, especially management accountants were increasingly challenged as the implementation of the ES progressed and the management accountants tried to conduct the new kinds of analyses that they knew were technically possible. More and more, the management accountants ran into dependencies on financial accounting. Those dependencies became a serious concern as they could not be resolved from the management accounting side but multiplied their workload.

So now I have to ask myself what effects does a process, a modification, a booking have on me in general,

but also on others? And how can I make sure that the effect I want to have (i.e., an effect only on management accounting) does not affect the other department. —Management accountant (Case E)

The point I'm facing right now is that the workload is extremely high for me. ... I'll just do the things that I can do. —Management accountant (Case E)

The management accountants, therefore, approached the financial accountants. In personal discussions, management accountants tried to convey their need of a solution that either resolved the emergent dependencies or allowed the management accounts to address them. The management accountants also showed willingness to take over some tasks from financial accounting if that were to resolve their dependencies. However, the management accountants grew increasingly frustrated as financial accounting did not help them to acquire the necessary information or even put effort into the resolution of the dependencies.

More than once we've had the basic problem of understanding what a cost element is and why management accounting needs it. Once you understand that, I would say, you can't forget it. ... Okay, all right. Once you understand it, you never forget it! Even if you may repeat the sentence differently it is clear. But we perceive that financial accounting colleagues are not willing to even remember this sentence. It is not important to them. —Management accountant (Case E)

Instead, financial accountants reinforced their role boundaries, making sure that no task could be taken from them or given to them by management accountants. In doing so, financial accountants emphasized the distinctiveness of their role and implied that management accountants should not try to renegotiate role boundaries.

I would say it's difficult. ... We in FI don't have the detailed knowledge we would need to understand what controlling [MA] is actually doing. And vice versa. —Financial accountant (Case A)

Yeah, well, the matter is, you have completely different requirements. Management accounting reports in a completely different directive compared to ours. We, in the sense of financial accountants, are strongly influenced by accounting guidelines and need to operate according to IFRS, and HGB [i.e., international and national commercial codes]. Management accounting is not at all interested in whether we have to prepare HGB financial statements or not. So, there is a separation because the focus is completely different. So, as I said, I don't think it will ever be like in small companies where the same person can do both

management and financial accounting. —Financial accountant (Case E)

Consequently, management accountants were not able to free any resources for more advanced analyses. In fact, they became unable to achieve their target identity. Instead, they resolved to coping strategies. Interestingly, the coping strategies were similar to the ones usually found in employees who perceive the implementation of a new ES as a threat to their identity. As such, management accountants reinterpreted the meaning of the management accounting role. In doing so, they emphasized aspects of their daily tasks that demonstrated the complexity of their traditional work and its significance for the success of their organization. They framed their traditional tasks as challenging and significant, enabling them to revert to their traditional professional role identity.

I wouldn't say that [I need more skills after implementation]. I would say that my work has always been extremely challenging because we look at processes end to end. —Management accountant (Case E)

Likewise, management accountants changed the importance of their target identity, emphasizing several potential downsides associated with the achievement of their target identity. For example, they argued that once they would have processed more analytical tasks, they would be losing contact with their business domain.

Through such routine activities, a management accountant also gets to know his area a little bit. Just by looking at individual bookings or going through individual receipts.

—Management accountant (Case E)

These coping strategies helped management accountants to revert back to their traditional professional role identity without experiencing a major incongruence based on the fact that they failed to achieve their target identity.

Speaking for myself, I do not see my satisfaction dependent on the change to the universal journal [i.e., the new ES]. It is exciting, just as it was before. There are always new topics coming in. But I would not say that makes me more satisfied or less—no, that's not how I am. —Management accountant (Case E)

In summary, in pattern 3, management accountants and financial accountants engaged in identity work related to the interdependencies that had been created by the new ES. Management accountants failed to achieve their target identity because they were unable to efficiently manage their interdependencies with financial accountants. Absent a shared identity, financial accountants reinforced their role boundaries and protected their professional role identity so that management accountants had no possibility of becoming less dependent on the financial accountants.

Analytical Abstraction: Identity Work of Interdependent Professional Groups with New ES

We elicited three patterns of identity work in management and financial accountants during ES implementations based on six cases. On a more general level, these patterns provide insight into three key aspects of identity work during the implementation of the new ES. (1) They help to understand the conditions under which the professional groups developed a target identity. (2) They show the conditions under which the professional groups were willing to renegotiate their role boundaries. (3) They help to understand the consequences of (not) achieving a target identity.

In the following, we draw on arguments rooted in identity theory (Burke and Stets 2022) and social identity theory (Tajfel and Turner 1986) to create an analytical abstraction of our findings. This analytical abstraction aims to speak more generally to the identity work of interdependent professional groups when the introduction of an ES alters their interdependencies. This abstraction results in five propositions as illustrated in Figure 4.

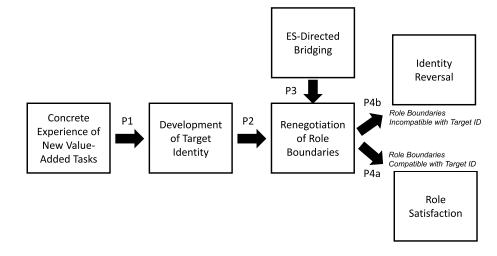
First, our findings show that there was a major difference between management accountants and financial accountants during the shakedown phase. Management accountants consistently developed a target identity, whereas financial accountants did not. We defined a target identity as a tentative enhanced professional role identity that professional groups actively strive to achieve. A target identity thus corresponds to a stable meaning of "who we are" but features a new meaning of "what we do" such that the new meaning of "what we do" makes us better at "who we are."

In our study, management accountants all made the concrete experience that they could technically use the

new ES to perform new types of analyses that could potentially have a high impact on management decisions. Thus, the management accountants discovered new activities that had not been part of their role before the implementation of the new ES but could add much value to their goal of supporting management decisions. The management accountants reasoned that the core activities of their role should no longer focus on gathering and providing correct numbers but should shift toward interpreting information across business areas on a larger scale. The financial accountants did not make such concrete experiences of new, value-added activities. Instead, they perceived only minor efficiency improvements in what they did anyway.

This consistent difference between management and financial accountants suggests that the concrete experience of new, value-added tasks is an important driver of target identity development. Prior research showed that users often perceive an ES as imaginary and irrelevant prior to the rollout; only after the rollout, when concrete experiences are being made, users come to understand the consequences of the technology for their identity (Alvarez 2008). From an identity theory perspective (Burke and Stets 2022), the target identity is a means by which professional groups define the key work activities that they want to perform in their roles and devise actions that enable them to perform these activities in their organizational settings. The key mechanism behind such an adaptation is that professionals strive for maximum congruency in their views of who they are and what they do (Pratt et al. 2006). In making concrete experiences with a new ES, users gain a more precise understanding of how the ES can be employed and what its benefits can be for their professional group. Previously vague ideas of what the new technology might achieve become concrete and meaningful as employees create and examine actual work results using the ES.

Figure 4. Propositions About the Identity Work of Interdependent Professional Groups in ES Implementation



Drawing on the established meaning of who they are as professionals and on their concrete experiences of what is technically possible with an ES, they adapt their concept of what they should do as a professional group in such a way that their core work activities become more consistent with the meaning of who they are. Thus, we propose Proposition 1.

Proposition 1. Professional groups that experience value addition to the core goals of their identity through the use of an ES are more likely to develop a target identity than professional groups that do not have such an experience.

Second, our study revealed significant differences in whether interdependent professional groups were willing to renegotiate their role boundaries in reaction to a new ES. Aiming to achieve their target identity, management accountants were willing to engage in such renegotiations, although they faced heavy workloads. As their dependence on financial accountants prevented management accountants from performing the new analyses they sought, they became willing to take on additional tasks in their role, even if the only benefit was to reduce interdependencies.

From a theoretical perspective, the development of a target identity acknowledges an inherent gap between the status quo of a professional group's core work activities and the work activities that would create more value for their professional role. It creates a strong drive for the professional group to influence their organizational environment, seeking to align organizational reality with their target identity in such a way that the meanings of who they are and what they do become more congruent. This parallels findings in prior work showing that individuals and groups have a strong urge to create congruent meanings of who they are and what they do and that they engage in intentional actions to achieve this congruence (Pratt et al. 2006, Sluss and Ashforth 2007, Nach 2015). Nonetheless, a target identity is tentative (cf. Boudreau et al. 2014) in that many obstacles, such as interdependencies with other professional groups or simple day-to-day workloads, may prevent the professional group from ever performing the desired new work activities on a regular basis. As a result, a target identity is not completely set in stone but necessarily provides some room for adjustment. Professional groups that depend on others in salient aspects of their target identity can, therefore, use this room for adjustment. They can try to renegotiate the role boundaries between the professional groups. For example, they can try to negotiate changes in the division of work or new ways of cooperation that shift any dependencies to less salient aspects of their target identity or remove them altogether.

By contrast, professional groups that have not developed a target identity work in their stable and nontentative professional role identity. Therefore, they have very

limited room for adjustment (Mishra et al. 2012, Craig et al. 2019). Deviations from established divisions of work or new modes of cooperation may easily result in incongruencies regarding the meaning of who they are and what they do; shifting role boundaries may also reduce the distinctiveness of their professional role compared with others. Prior work shows that professional groups try to prevent incongruencies in who they are and what they do (Nach 2015, Stets and Serpe 2016) and that they aim for distinctiveness in their role (Vaast and Pinsonneault 2021). Thus, we propose Proposition 2.

Proposition 2. Professional groups that have developed a target identity are more willing to renegotiate their role boundaries with interdependent professional groups than professional groups that have not developed a target identity.

A key difference between pattern 2 and pattern 3 in our study was whether the interdependent professional groups received ES-directed bridging. ES-directed bridging practices are boundary-spanning activities by third parties (e.g., managers, consultants, and implementation teams) that help professional groups to mutually understand and appreciate their challenges regarding an ES implementation. Examples included joint workshops about the new ES, user training, guidance on how to understand shared processes in the ES, and high-level recommendations on how to interact. Management and financial accountants in our cases were all willing to renegotiate their role boundaries if a third party had strongly engaged in ES-directed bridging practices with them (pattern 2). However, financial accountants who did not receive ES-directed bridging tended to protect their professional role identity from any changes and did not agree to renegotiate role boundaries with management accountants (pattern 3).

Although they do not directly manipulate role boundaries, ES-directed bridging practices constitute a powerful facilitator of role boundary renegotiation between professional groups. As third parties engage in ES-directed bridging, they foster a degree of mutual understanding between interdependent professional groups that allows the professional groups to communicate more easily, even though this communication may primarily concern the ES. During bridging activities, individual members learn about the challenges and needs of the other professional group, which allows them to better understand the core elements of the other group's role identity and account for those elements in renegotiating their role boundaries.

This view on bridging practices resonates with prior work that shows how bridging practices can improve the mutual understanding of individuals and groups across cultural, temporal, organizational, and intraorganizational boundaries (Ancona and Caldwell 1992, Pawlowski and Robey 2004, Sarker and Sarker 2009, Su 2015). Bridging practices enable individuals to build

and leverage context-dependent knowledge structures to make sense of interactions with different groups and adjust their behavior accordingly (Su 2015). In doing so, bridging practices can considerably contribute to the performance of individuals and work groups that regularly interact with others across boundaries (Ancona and Caldwell 1992, Su 2015). Prior work also shows that bridging practices are often closely linked to information systems (Pawlowski and Robey 2004, Huber et al. 2020). Shared information systems can be used as boundary objects that users or developers discuss from their different perspectives and thereby, come to mutually understand their viewpoints (Huber et al. 2020). Especially when ESs are shared and used by multiple organizational units, knowledge transfer across user groups can be facilitated through bridging practices of those organizational actors in charge of the ES. They can, for example, help to surface and challenge contradictory assumptions, translate information from one organizational context to another, and help users interpret the needs and actions of other user groups (Pawlowski and Robey 2004).

From an identity theory perspective, ES-directed bridging constitutes an important trigger for the re-evaluation of one's professional role identity. When third parties, such as managers, consultants, or implementation teams, work with professional groups in bridging practices, they provide implicit and sometimes explicit appraisals of how well members of a professional group perform their role from the third party's perspective. Such appraisals trigger self-verification processes and can increase or decrease self-efficacy and motivation depending on whether the appraisal is favorable or not (Burke and Stets 2022). If third parties appraise close interactions across professional groups as particularly positive in the scope of an ES implementation, then members of those professional groups are triggered to engage in closer interactions, which facilitates future renegotiations of role boundaries. In line with our arguments, prior identity research has described such processes as "boundary blurring," a mechanism that allows members of one professional group to be behaviorally involved in another professional group without negative effects on their identity (Cardador and Pratt 2018). The professional groups may, for a limited time, engage in overlapping tasks without suffering negative consequences from the lack of group distinctiveness that comes with overlapping tasks (Ashforth et al. 2000). Professional groups that receive ES-directed bridging can, therefore, more easily take on overlapping tasks and thus, more easily renegotiate who does what in their organization. Thus, we propose Proposition 3.

Proposition 3. *ES-directed bridging increases the willingness of interdependent professional groups to renegotiate professional role boundaries.*

Finally, our study elicited the outcomes of identity work in cases where interdependent professional groups achieved their target identity and in cases where interdependent professional groups failed to achieve their target identity. We found that management accountants who achieved their target identity by successfully renegotiating their role boundaries (pattern 2) became more satisfied with their roles. Those management accountants were able to use the new ES to provide new types of high-impact analyses to top management and consequently, felt a stronger fit between who they were and what they did as professionals.

More generally, professional groups that achieve their target identity after renegotiating professional role boundaries evaluate who they are and what they do as more congruent than before. As suggested by identity theory and found in prior work, congruency of who one is and what one does serves for identity verification and creates satisfaction with one's role (Ma and Agarwal 2007, Stets and Serpe 2016, Kyratsis et al. 2017, Burke and Stets 2022). Thus, professional groups that achieve their target identity after renegotiating role boundaries become more satisfied.

In contrast, we also observed that professional groups that failed to achieve their target identity reverted to their original professional role identity (pattern 3). Note that we did not find evidence of emotional distress in any of these professional groups, which would be expected if they had concluded that who they are and what they do were completely incongruent (Nach 2015). Instead, these professional groups engaged in identity threat coping responses, namely meaning change and importance change. Such identity threat coping responses have previously been observed when a salient identity was threatened (Kreiner et al. 2009, Petriglieri 2011, Mishra et al. 2012, Holmes et al. 2016, Craig et al. 2019) but not in relation to tentative identities.

This is interesting because a target identity is a tentative identity, which intrinsically carries the possibility that one may not be able to achieve it. Accordingly, reverting to one's original salient identity is a natural consequence when a tentative identity cannot be achieved (Ashforth et al. 2000). In fact, prior work on tentative identities even suggests that they are completely new, provisional notions of who one is and what one does that can be quickly and easily abandoned (Boudreau et al. 2014, Nelson and Irwin 2014). If this was the case for a target identity, one would not expect to find identity restructuring responses directed toward it because there would be no harm to one's selfevaluation in abandoning such a provisional notion. However, a target identity carries the stable meaning of who one is and features a new meaning of what one does. Therefore, target identities are more stable and more salient than previously studied tentative identities, making it harder to discard target identities without causing harm to one's self-evaluation. Consequently, when a target identity cannot be achieved, identity threat coping responses are triggered in a manner similar to when a salient identity is threatened. Thus, we propose Proposition 4.

Proposition 4. (a) Professional groups that achieve their target identity become more satisfied with their role. (b) Professional groups that experience an inability to achieve their target identity revert to their original professional role identity through identity threat coping mechanisms.

Discussion and Conclusion

We investigated how the implementation of an ES influenced the identity work of interdependent professional groups in an organization. Drawing on a revelatory context, we examined the identity work of management accountants and financial accountants in six cases. We proposed the construct of a target identity (i.e., a tentative enhanced professional role identity that professional groups actively strive to achieve) and described three patterns of identity work observed in the cases. Based on these findings, we presented five propositions about the identity work of interdependent professional groups during ES implementation.

Theoretical Contributions

This work contributes to the literature in two major ways. First, we contribute to theory on the impact of ESs on identity work in organizations. Although research has provided some insights into the identity work of professional groups working in relative isolation when they are confronted with new ESs (Boudreau et al. 2014, Nelson and Irwin 2014, Strich et al. 2021), prior work has not engaged with the identity work of interdependent professional groups. This was a major shortcoming because large ES implementations usually concern many interdependent professional groups in an organization. We provide five testable propositions about the conditions under which interdependent professional groups develop a target identity, about the consequences of (not) achieving a target identity, and about the willingness of interdependent professional groups to renegotiate their role boundaries in the scope of an ES implementation. In doing so, our work helps us to understand that interdependencies with other groups shape professional groups' willingness and desire to alter their professional role boundaries when faced with a new ES. It also points to the importance of ES-directed bridging practices in ES implementation projects. Where the rich literature on bridging established that bridging can be an important driver of knowledge transfer and performance (Ancona and Caldwell 1992, Pawlowski and Robey 2004, Su 2015), our work emphasizes that ES-directed bridging can also influence the

identity work of interdependent professional groups. Elaborating on these aspects of identity work provides a considerably more nuanced understanding of why professional groups in ES implementation projects react differently and how they end up with very different ES usage behaviors. Although our results are based on an empirical focus on management and financial accountants, we believe that our findings and propositions transfer to other contexts of interdependent professional groups confronted with a new ES because they are in line with identity theory and resonate with prior empirical work.

Second, we add to research on professional role identity (e.g., Alvarez 2008, Cardador and Pratt 2018) by proposing the construct of a target identity. A popular theme in this stream of literature is the influence of ES-triggered changes in work processes on the identity of professionals (e.g., Lamb and Davidson 2005, Alvarez 2008, Mishra et al. 2012, Jussupow et al. 2022a). However, research in this area has not sufficiently considered how and under which conditions some professional groups successfully adopt new or enhanced professional role identities, whereas others cling to their extant identities (Boudreau et al. 2014). The target identity construct facilitates a substantially more nuanced understanding of the impact of ES-triggered changes on the role identity of professional groups. It helps to understand that during early implementation stages, the ES directly influences the target identity that professional groups develop and begin to strive for. Concrete experiences with the technical artifact and with the valueadded tasks that the artifact enables trigger identity work in professional groups more than the changes in daily work. During later implementation stages, professional groups try to align their actual work activities with their target identity. Thus, the target identity construct conveys that observable changes in work processes are not directly determined by the ES but are partly an outcome of identity work. If professional groups are not able to achieve their target identity, they alter the meaning of their professional role identity and devalue the importance of their target identity. This kind of coping mechanism has previously been observed in professionals who feel threatened in their salient professional role identity (Petriglieri 2011). Hence, the target identity construct helps to understand that professional groups perceiving a new ES as an identity enrichment opportunity, but failing to leverage this opportunity, cope in ways similar to professionals who initially perceive the new ES as a threat to their original role identity. Finally, the target identity construct facilitates a better understanding of the professional identity construction process. More specifically, our research adds to prior work that suggests that major changes in job characteristics are likely to trigger identity threat coping responses, whereas minor changes are likely to stimulate identity enrichment (Pratt et al. 2006). The target identity construct helps understand that even major changes in work processes can lead to professional identity enrichment, at least when professionals make the concrete experience that the changes add to the core goals of their identity.

Practical Implications

Practitioners can benefit from our study in ES adoption, implementation, and use phases. During the adoption phase, understanding the impact of an ES on interdependent professional groups enables organizations to improve the organizational fit of the new ES, which is crucial for successful implementation (Hong and Kim 2002, Bala and Venkatesh 2015, Venkatesh and Goyal 2022). Specifically, organizations that observe the concrete experiences that user groups make with a new ES and examine whether they develop target identities can better understand sources of potential conflict and spot user group-specific needs for training and change management. During the implementation phase, the described patterns can guide projects to identify risks related to altered and emergent interdependencies between professional groups and to initiate countermeasures in advance. For example, if only one of two interdependent professional groups has developed a target identity, the organization should initiate ES-directed bridging. In fact, ES-directed bridging constitutes a promising practice for most settings of interdependent professional groups using an ES. During the use phase, the findings help managers and IS leaders to spot and deal with professional groups that have failed to achieve their target identity and to devise actions so that those groups do not become dissatisfied. Because of our research context, this study is particularly valuable for organizations that plan to implement ERP systems with merged modules. Our results enable these companies to openly address the merger of modules to increase implementation success. Given that the ERP system in our study is widely used in industry and even more often scheduled for implementation (Gartner 2018, 2021), our research is relevant to many organizations.

Limitations and Future Work

Future research can build on our work in at least three directions. First, future research can aim to reproduce, sharpen, and extend our work starting from its limitations. As such, our revelatory multiple case study focused on two specific professional groups, management and financial accountants, that were faced with one specific version of a new ES. This research design allowed us to elicit consistent identity work patterns across six cases, which are more organizational contexts than in most other studies on identity work. However, this research design also limited the diversity of our data so that the findings warrant re-examination in

other settings. For example, management accountants in our study consistently developed a target identity, whereas financial accountants did not. Thus, contexts where multiple interdependent professional groups develop target identities, possibly overlapping or conflicting ones, deserve closer examination. Moreover, in our study, management accountants had many sequential task dependencies on financial accountants, whereas there were fewer dependencies vice versa. Contexts with more and other types of dependencies between professional groups, such as pooled or reciprocal resource dependencies (Crowston 1997), could potentially change their identity work.

Second, we have put forward five propositions that were derived from our inductive findings and align with the core tenets of identity theory. Future work should engage in testing these propositions. A natural next step in this way would be observational studies in domains where groups of professionals work together interdependently using an ES that undergoes drastic changes. For example, as organizations implement lowcode platforms, the interdependent activities of software developers, designers, and users undergo massive changes (Elshan et al. 2023), which may lend themselves to examining the corresponding identity work in those groups. Likewise, as increasingly powerful medical systems based on artificial intelligence are implemented, interdependent groups of medical professionals may change the way how they work together (Jussupow et al. 2021, 2022b). In contexts like these, future research can rely on our conceptualizations to document and assess the development of a target identity, the conditions under which it happens, and the consequences of achieving a target identity. Such assessments can ultimately be used to support, refute, or refine our propositions based on a wider variety of context-dependent data.

Third, future research should examine the utility of the target identity construct in a setting where the achievability of a target identity is independent of other professional groups. Our study showed that once professional groups depend on others in their daily tasks, they can only achieve their target identity if the other group behaves cooperatively. However, because of our research context, our work did not elaborate on how professional groups pursue a target identity if the success of their identity work is exclusively in their own hands. Future research should, therefore, delve deeper into the transition from formulating a target identity to achieving it or coping with the failure to do so. Such work would further sharpen our target identity construct and help to better understand professional role identity.

References

Alvarez R (2008) Examining technology, structure and identity during an enterprise system implementation. *Inform. Systems J.* 18(2):203–224.

- Ancona DG, Caldwell DF (1992) Bridging the boundary: External activity and performance in organizational teams. Admin. Sci. Ouart. 37(4):634–665.
- Ashforth BE, Kreiner GE, Fugate M (2000) All in a day's work: Boundaries and micro role transitions. Acad. Management Rev. 25(3):472–491.
- Bala H, Venkatesh V (2015) Adaptation to information technology: A holistic nomological network from implementation to job outcomes. *Management Sci.* 62(1):156–179.
- Bernardi R, Sarker S, Sahay S (2019) The role of affordances in the deinstitutionalization of a dysfunctional health management information system in Kenya: An identity work perspective. *MIS Quart.* 43(4):1177–1200.
- Boudreau MC, Serrano C, Larson K (2014) IT-driven identity work: Creating a group identity in a digital environment. *Inform. Organ.* 24(1):1–24.
- Burke PJ, Stets JE (2022) *Identity Theory*, 2nd ed. (Oxford University Press, New York).
- Cardador MT, Pratt MG (2018) Becoming who we serve: A model of multi-layered employee–customer identification. *Acad. Man-agement J.* 61(6):2053–2080.
- Carter M, Grover V (2015) Me, myself, and I(T): Conceptualizing information technology identity and its implications. MIS Quart. 39(4):931–957.
- Carter M, Petter S, Grover V, Thatcher JB (2020a) IT identity: A measure and empirical investigation of its utility to IS research. J. Assoc. Inform. Systems 21(5):1313–1342.
- Carter M, Petter S, Grover V, Thatcher JB (2020b) Information technology identity: A key determinant of IT feature and exploratory usage. MIS Quart. 44(3):983–1021.
- Chreim S, Williams BE, Hinings CR (2007) Interlevel influences on the reconstruction of professional role identity. *Acad. Management J.* 50(6):1515–1539.
- Clark SM, Gioia DA, Ketchen DJ, Thomas JB (2010) Transitional identity as a facilitator of organizational identity change during a merger. Admin. Sci. Quart. 55(3):397–438.
- Craig K, Thatcher JB, Grover V (2019) The IT identity threat: A conceptual definition and operational measure. *J. Management Inform. Systems* 36(1):259–288.
- Crowston K (1997) A coordination theory approach to organizational process design. *Organ. Sci.* 8(2):157–175.
- Eisenhardt KM (1989) Building theories from case study research. Acad. Management Rev. 14(4):532–550.
- Elshan E, Ebel P, Söllner M, Leimeister JM (2023) Leveraging low code development of smart personal assistants: An integrated design approach with the SPADE method. *J. Management Inform. Systems* 40(1):96–129.
- Gartner (2018) Competitive landscape: SAP S/4HANA service providers. Accessed March 23, 2019, https://www.gartner.com/en/documents/5355563.
- Gartner (2021) Gartner forecasts worldwide IT spending to grow 6.2% in 2021. Accessed June 30, 2021, https://www.gartner.com/en/newsroom/press-releases/2020-01-25-gartner-forecasts-worldwide-it-spending-to-grow-6-point-2-percent-in-2021.
- Gioia DA, Corley KG, Hamilton AL (2013) Seeking qualitative rigor in inductive research: Notes on the Gioia methodology. Organ. Res. Methods 16(1):15–31.
- Grabski S, Leech SA, Sangster A (2009) Management Accounting in Enterprise Resource Planning Systems (Elsevier, Amsterdam).
- Holmes IVO, Whitman MV, Campbell KS, Johnson DE (2016) Exploring the social identity threat response framework. Equality Diversity Inclusion 35(3):205–220.
- Hong KK, Kim YG (2002) The critical success factors for ERP implementation: An organizational fit perspective. *Inform. Management* 40(1):25–40.
- Huber TL, Winkler MAE, Dibbern J, Brown CV (2020) The use of prototypes to bridge knowledge boundaries in agile software development. *Inform. Systems J.* 30(2):270–294.

- Ibarra H (1999) Provisional selves: Experimenting with image and identity in professional adaptation. Admin. Sci. Quart. 44(4):764–791.
- Jussupow E, Spohrer K, Heinzl A (2022a) Identity threats as a reason for resistance to artificial intelligence: Survey study with medical students and professionals. *JMIR Formative Res.* 6(3): e28750.
- Jussupow E, Spohrer K, Heinzl A (2022b) Radiologists' usage of diagnostic AI systems—The role of diagnostic self-efficacy for sensemaking from confirmation and disconfirmation. Bus. Inform. Systems Engrg. 64(3):293–309.
- Jussupow E, Spohrer K, Heinzl A, Gawlitza J (2021) Augmenting medical diagnosis decisions? An investigation into physicians' decision-making process with artificial intelligence. *Inform. Systems Res.* 32(3):713–735.
- Kreiner GE, Hollensbe EC, Sheep ML (2009) Balancing borders and bridges: Negotiating the work-home interface via boundary work tactics. Acad. Management J. 52(4):704–730.
- Kyratsis Y, Atun R, Phillips N, Tracey P, George G (2017) Health systems in transition: Professional identity work in the context of shifting institutional logics. *Acad. Management J.* 60(2): 610–641.
- Lamb R, Davidson E (2005) Information and communication technology challenges to scientific professional identity. *Inform. Soc.* 21(1):1–24.
- Lapointe L, Rivard S (2005) A multilevel model of resistance to information technology implementation. MIS Quart. 29(3):461–491.
- Ma M, Agarwal R (2007) Through a glass darkly: Information technology design, identity verification, and knowledge contribution in online communities. *Inform. Systems Res.* 18(1):42–67.
- Mahlendorf MD, Martin MA, Smith D (2023) Innovative data—Usecases in management accounting research and practice. Eur. Accounting Rev. 32(3):547–576.
- Markus ML (1983) Power, politics, and MIS implementation. *Comm. ACM* 26(6):430–444.
- Miles MB, Huberman AM (1994) Qualitative Data Analysis: An Expanded Sourcebook, 2nd ed. (Sage Publications, Los Angeles).
- Mishra AN, Anderson C, Angst CM, Agarwal R (2012) Electronic health records assimilation and physician identity evolution: An identity theory perspective. *Inform. Systems Res.* 23(3): 738–760.
- Myers MD, Newman M (2007) The qualitative interview in IS research: Examining the craft. *Inform. Organ.* 17(1):2–26.
- Nach H (2015) Identity under challenge: Examining user's responses to computerized information systems. *Management Res. Rev.* 38(7):703–725.
- Nach H, Lejeune A (2010) Identity under challenge. *Comput. Human Behav.* 26(4):618–629.
- Nelson AJ, Irwin J (2014) "Defining what we do—All over again": Occupational identity, technological change, and the librarian/internet-search relationship. *Acad. Management J.* 57(3):892–928.
- Pawlowski SD, Robey D (2004) Bridging user organizations: Knowledge brokering and the work of information technology professionals. *MIS Quart*. 28(4):645–672.
- Petriglieri JL (2011) Under threat: Responses to and the consequences of threats to individuals' identities. *Acad. Management Rev.* 36(4):641–662.
- Pratt MG, Rockmann KW, Kaufmann JB (2006) Constructing professional identity: The role of work and identity learning cycles in the customization of identity among medical residents. *Acad. Management J.* 49(2):456–493.
- Reay T, Goodrick E, Waldorff SB, Casebeer A (2017) Getting leopards to change their spots: Co-creating a new professional role identity. Acad. Management J. 60(3):1043–1070.
- Richardson AJ (2002) Professional dominance: The relationship between financial accounting and management accounting: 1926–1986. Accounting Historians J. 29(2):91–121.

- Richardson AJ (2017) The relationship between management and financial accounting as professions and technologies of practice. Goretzki L, Strauss E, eds. *The Role of the Management Accountant: Local Variations and Global Influences* (Routledge, New York), 246–261.
- Richardson AJ, Jones DB (2007) Professional "brand": Personal identity and resistance to change in the Canadian accounting profession: A comparative history of two accounting association merger negotiations. *Accounting History* 12(2):135–164.
- Sarker S, Sarker S (2009) Exploring agility in distributed information systems development teams: An interpretive study in an offshoring context. *Inform. Systems Res.* 20(3):440–461.
- Simon T (2017) Is your management accounting function ready for SAP S/4HANA? Retrieved June 15, 2021, https://www.linkedin.com/pulse/your-management-accounting-function-ready-sap-s4hana-todd-simon.
- Sluss DM, Ashforth BE (2007) Relational identity and identification: Defining ourselves through work relationships. Acad. Management Rev. 32(1):9–32.
- Stein M, Galliers R, Markus M (2013) Toward an understanding of identity and technology in the workplace. *J. Inform. Tech.* 28(3):167–182.
- Stets JE, Serpe RT, eds. (2016) New Directions in Identity Theory and Research (Oxford University Press, New York).
- Strauss AL, Corbin JM (1990) Basics of Qualitative Research: Grounded Theory Procedures and Techniques, 2nd ed. (Sage Publications, Los Angeles).
- Strich F, Mayer AS, Fiedler M (2021) What do I do in a world of artificial intelligence? Investigating the impact of substitutive

- decision-making AI systems on employees' professional role identity. *J. Assoc. Inform. Systems* 22(2):304–324.
- Stuetz V (2017) Understanding the universal journal in SAP S/4HANA. Accessed August 28, 2021, https://blogs.sap.com/2017/03/01/understanding-the-universal-journal-in-sap-s4hana/.
- Su N (2015) Cultural sensemaking in offshore information technology service suppliers: A cultural frame perspective. MIS Quart. 39(4):959–983.
- Tajfel H, Turner JC (1986) The social identity theory of intergroup behavior. Worchel S, Austin WG, eds. Psychology of Intergroup Relations (Nelson Hall, Chicago), 7–24.
- Vaast E, Pinsonneault A (2021) When digital technologies enable and threaten occupational identity: The delicate balancing of data scientists. MIS Quart. 45(3):1087–1112.
- Venkatesh V, Goyal S (2022) Impact of an enterprise system implementation on job outcomes: Challenging the linearity assumption. *J. Management Inform. Systems* 39(1):6–40.
- Venkatesh V, Zhang X, Sykes TA (2011) "Doctors do too little technology": A longitudinal field study of an electronic healthcare system implementation. *Inform. Systems Res.* 22(3):523–546.
- Walz S, Tritschler J, Rupp R (2017) Erweitertes Management Reporting mit SAP S/4HANA auf Basis des Universal Journals: Realtime-Ergebnisreporting mit umfassenden Auswertungsmöglichkeiten durch die Weiterentwicklung der Financials-Funktionalität. Working paper no. 164, Hochschule Pforzheim, Pforzheim, Germany.
- Yin RK (1994) Case Study Research, Design and Methods, 2nd ed. (Sage Publication, Newbury Park, CA).