Organizational Collaboration in Times of Hybrid Work Arrangements: An Experiential Computing Perspective

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Introduction

Millions of people all over the world were forced to stop their daily business and to work from home due to restrictions induced by the COVID-19 pandemic. Without digital technology, continuing daily business as usual, including communication and meetings, would not have been possible (McKinsey, 2020). Digital technologies are the bridge that enables being connected, despite social distancing and physical distribution. Thereby, "the pandemic could be the starting point of a new era for world-wide flexible working arrangements and digital team collaboration" (Waizenegger et al. 2020, p. 11). Consequently, the process of digitalization has been accelerated by governmental restrictions (Deloitte, 2021). Besides the physical distribution of teams within organizations, a significant change was induced in collaborating with customers (McKinsey, 2020).

In the end, on-site meetings were no longer feasible, which lead to a historical shift of conducting meetings virtually from home as an essential part of people's daily work experience (PwC, 2020). In the aftermath of the first waves of the pandemic in summer 2021, many firms adopted hybrid work arrangements in which employees partly work in the office and in part at home. Thus, hybrid working modes including virtual meetings became the so-called new normal (Glas, 2022) giving rise to the question how hybrid work arrangements changed customer relations during the COVID-19 pandemic.

Because internal communication and collaboration such as customer relations are an important aspect for organizations, e.g., in the business-to-business (B2B) industry, academic research has been establishing insights for a long time (Harrison-Walker & Neeley, 2004). However, due to the abrupt shift in working conditions, and the resulted need for insights, the information systems (IS) literature is growing on topics about changes induced by the COVID-19 pandemic (Fang et al., 2021; Mykytyn, 2020; Sakurai & Chughtai, 2020). Despite the essential role of digital technologies in the pandemic-induced changes to distributed collaboration and virtual meetings in hybrid work arrangements (Hacker et al., 2020; Li, 2021), the IS literature currently lacks an in-depth understanding of potential mid- and long-term consequences (He et al., 2021; Sakurai & Chughtai, 2020). Building on digital technologies as an enabler of hybrid work during and in the aftermath of the pandemic, we aim to address a pressing research issue. The need for such insights is enforced by the topicality of the pandemic situation and the centrality of digital technologies in this context. Therefore, we pose the following research question: *How do hybrid work arrangements including virtual meetings change organizational collaboration?*

To address the research question, we apply the perspective of experiential computing as

theoretical lens (Yoo, 2010). We aim to contribute to research on digital technology use in times of crisis and its consequences for customer collaboration in hybrid work arrangements. We conducted 19 in-depth semi-structured interviews with a single-case study in a leading B2B consulting company. In this industry, personalities and not products are of higher interest to customers (Turner, 1982). This helps us to identify the influence of hybrid work arrangements on intra- as well as interorganizational collaboration in a setting which strongly depends on good customer relationship and makes our case suitable to answer our research question. Given the limited IS literature, a qualitative, inductive approach was chosen. The derived findings contribute to a deeper level of understanding on the use of digital artifacts and its effects on customer collaboration in hybrid work arrangements. By constantly focusing on the role of digital technologies, valuable insights and interrelations were derived, serving as basis for future research in the IS field.

Theoretical background

Our study consists of two foundations: first, the role of digital technologies. Hereby, we draw on the concept of *experiential computing* (Yoo, 2010) providing an appropriate theoretical lens. Second, we focus on *hybrid work and virtual meetings*.

Experiential computing refers to the use and the experiences of humans regarding digital artifacts (Yoo, 2010). While in the early years, Dennis et al. (1988) identified the environment as one key element in a meeting, Yoo (2010) aims to break up old ways of looking at computers and human beings by taking into account more dimensions. In experiential computing, computers and humans are not regarded as separated entities, but computing is seen as an integral part of everyday human experiences (Yoo, 2010). In this framework, the experience of a human-beings is at the center of the four dimensions, namely: i) actors, ii) artifacts, iii) time, and iv) space. A human exists in the dimension *space* (e.g., being close or far away), within a special, temporary *time* (being in the 'now'), experiencing other social *actors* and *artifacts* (Yoo, 2010). Further studies investigate the relation between humans and technology, evolving throughout the period of use (Bødker et al., 2014). We aim to identify the consequences of the use of digital technologies (*artifacts*) in daily interactions between different parties (*actors*: consultants and customers) within a specific *time* and *space*. The format of the meeting plays a decisive role, namely whether it takes place on-site in the actor´s office, or virtually (space: distributed / far away). These parallels to our case support the suitability of experiential computing as our main theoretical lens. Furthermore, we respond to existing IS literature currently lacking an application of experiential computing as theoretical lens to understand collaboration in hybrid work arrangements (Bødker, 2017; Halford, 2005; Yoo, 2010). Given the growing importance of hybrid work including virtual meetings and the associated digital technology use, it increasingly becomes essential to investigate the associated implications in more detail.

Hybrid work and virtual meetings: Meetings in general can be conceived as an event, where people come together (Dennis et al., 1988). Thereby, communication plays a central role and is well-studied in the IS literature using different technologies for supporting meetings (e.g., Bødker et al., 2014; Watson-Manheim & Bélanger, 2007). For instance, Dennis et al. (1988) introduce a conceptual model on electronic meeting systems (EMS),

which helps to support decision-making as well as communication in meetings. Besides the EMS, several other terms and technology systems are introduced to examine digital technologies use in meetings, e.g., on the impact on participant's behavior (Chidambaram, 1996) or on effectiveness and efficiency of information exchange (Jarvenpaa et al., 1988). Altogether, researchers find positive impact of digital technology use in meeting processes. However, recent IS research recognizes changes in the technology used over the last decades and hybrid work including virtual meetings have become part of our everyday life (Hacker et al., 2020; Sakurai & Chughtai, 2020; Waizenegger et al., 2020), especially in the business context (Mykytyn, 2020). However, current literature mostly focuses on the context of intra-organizational virtual teams (Fang et al., 2021; Waizenegger et al., 2020) which highlights the lack of research on hybrid work including interorganizational settings.

Methodology

To answer our research question, we conduct a single-case study and followed the grounded theory approach (Corbin & Strauss, 1990; Myers, 2013). The case selected is a leading B2B consulting firm located in the DACH region and headquartered in Germany. This case proves to be particularly suitable for the study, since this company is based on a business model that thrives on good and long-term customer relationships and collaboration. The company is a medium-sized business with approximately 60 employees, where every consultant is involved in different projects. Consultants work closely in direct contact with their customers. The goal of the consultants is to help optimizing their customers' business processes by advising and supporting them in the realization of business objectives. Regarding the case selection, we followed the criteria of Yin (2014), i.e., sufficient access to data, as well as that of Myers (2013), allowing data triangulation. To allow unbiased conclusions, the sample consists of two opposing parties (Yin 2014). Further, we hereby followed the process of "theoretical sampling" (Corbin & Strauss, 1990, p. 9). We conducted 19 semi-structured interviews in summer 2021. To ensure diverse perspectives, ten interviews were conducted with consultants being employed between 6 months and nearly 10 years (3.5 years on average) and nine with customers of the consultancy being clients of the case company between 9 months and 5 years (2.4 years on average). In addition, we complement our data by three work diaries from a hybrid event series organized by the case company as well as the company's customer satisfaction surveys from 2019 and 2020. The data was analyzed in an iterative process. The process included comparing insights to existing theories to identify patterns, using open, axial, and selective coding (Corbin & Strauss, 1990).

Results

In our study, we disentangle the key concepts, which grasp consequences for intra- and interorganizational collaboration from virtual meetings and hybrid work in B2B contexts induced by an international pandemic. To structure the concepts, we relied on experiential computing (Yoo, 2010) and derived a process model (see Figure 1). As basis for hybrid work including virtual meetings and collaboration, we find *digital artifact use* on the left side as first pillar. This in turn, is used in different contexts and thereby contributing in

several ways to the *experiences* of the different actors (consultants, customers). Due to hybrid work, digital artifacts are experienced in virtual meetings, differentiated in their occasions. These experiences in turn lead to *consequences* for on the one hand, the individuals, and on the other had for customer relations.

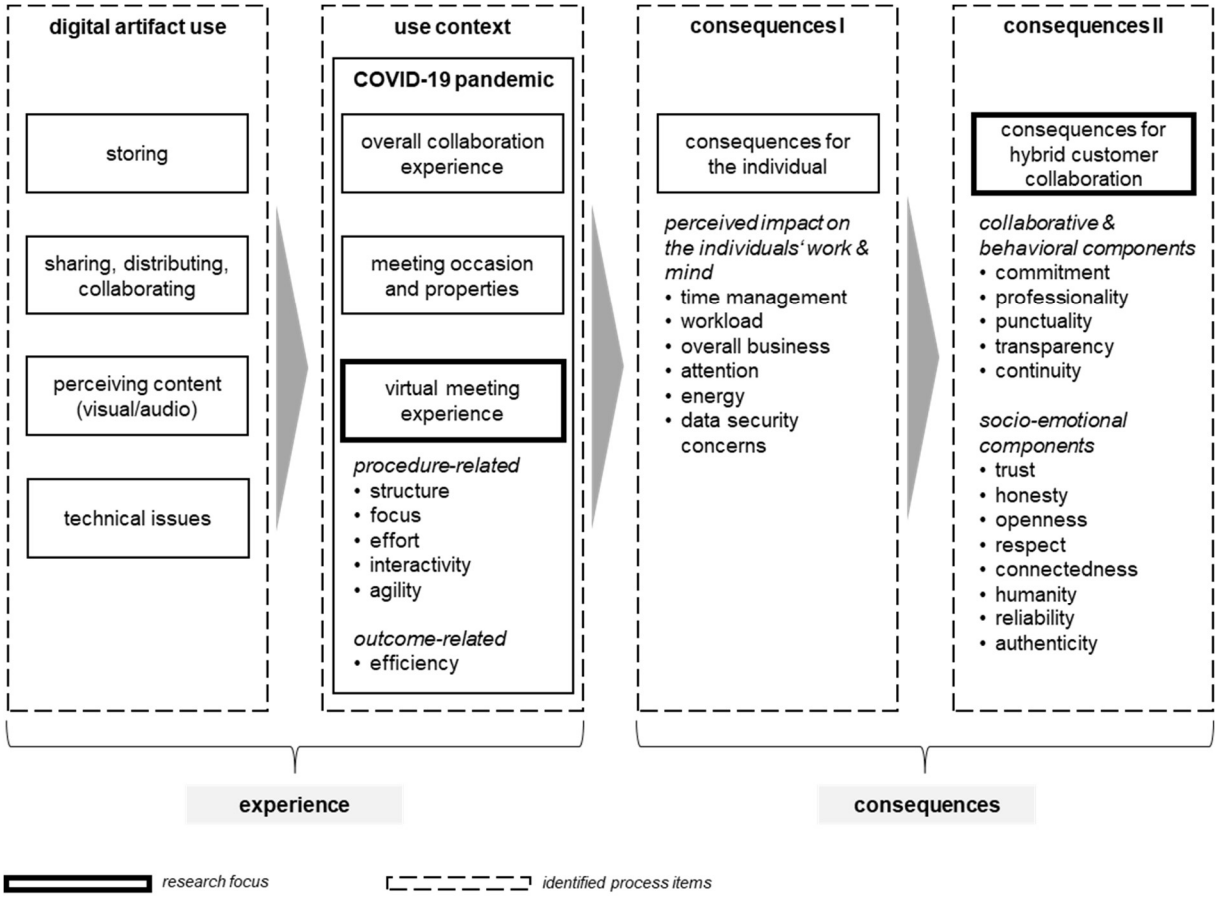

Figure 1. Consequential process of virtual meetings and hybrid work arrangements on intra- and interorganizational collaboration.

Discussion

We contribute to literature on the use of digital technologies in the workplace during times of crisis (Hacker et al., 2020) as well as hybrid work (Halford, 2005; Waizenegger et al., 2020) by disentangling crucial factors for intra- and interorganizational collaboration. Furthermore, we expand the understanding of experiential computing (Yoo, 2010) in a work-related context by highlighting how practices of digital artifact use influence virtual meeting experiences as well as impact different actors (e.g., employees).

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