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## The dual role of line managers in the implementation of a semi-digital HR tool

How does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?

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#### <u>Abstract</u>

Sensemaking and sensegiving is part of daily organizational life, especially during transformations. However, academic literature often focuses solely on the role of upper management and workfloor employees when it comes to sensemaking and sensegiving theories and leave the role of line management mainly unexplored. Yet, line managers play a vital role during organizational change as they need to both make sense of the new situation and simultaneously give sense to it towards their team. Line managers therefore inhabit a crucial dual role during organizational change that is barely addressed in academic literature. Especially the effect of line manager's personal sensemaking on their sensegiving process is widely unexplored. Also, more literature on sensemaking than on sensegiving seems to be available: on Google scholar, searching for the term 'sensemaking' achieves 251.000 results whereas the term 'sensegiving' achieves a comparatively low number of results with 18.600 findings. Therefore, this study aims to answer the research question "how does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?".

Using qualitative research methods, this study shows that the line manager's sensegiving process during the implementation of a semi-digital HR tool seems to be influenced by his personal sensemaking mainly regarding three topics: attributed status, feeling of involvement, and personal convictions. Also, external factors such as size of the line manager's team were found to have an impact on the line manager's sense jving procedure. What was found is that line managers are either positioned as managers or employees which leaves them no choice but to either make sense or give sense. However, the positioning of the line managers in the strategic role as paradox navigators could help increase the efficiency of line managers during digitalization: instead of being subjectively involved as either manager of a team or as team member the role of paradox navigator would allow the line manager to overtake an objective viewpoint outside of his conventional roles. The effect of positioning line managers in a more objective role and its effect on the sense jving of the line manager could provide new insights on the factors influencing the effectiveness of the line manager's sensegiving. Practically, the findings of this study suggest that during digitalization an organization should bear in mind that the line manager's personal frames - meaning his personal beliefs about something based upon past experiences - should be aligned with the organizational frame on the digitalization in order to make the introduction of it more likely to be successful. The more the line manager feels part of the digitalization, the more likely he is to positively give sense to it.

Keywords: sensemaking; sensegiving; dual role line management

#### 1. Introduction

Effective communication between the different layers of an organization is important for both organizational efficiency and productivity. Paying attention to the way in which different organizational layers understand and communicate certain situations is crucial as sensemaking is a big part of daily organizational life: individuals make sense of interactions or events and at the same time also give sense to their environment through their reaction to that occurrence. Sensemaking occurs as the response to events which challenge an individual's current view of the world (Balogun & Johnson, 2004; Maitlis, 2005; Maitlis & Christianson, 2014). Sensegiving on the other hand is described as the way individuals interpret a situation and communicate their thoughts about it with peers (Rouleau, 2005). The aim of sensegiving is to influence the sensemaking of others towards a favoured redirection of the situation (Gioia & Chittipeddi, 1991; Maitlis et al., 2010). Both sensemaking and sensegiving enable the communication between different organizational levels and without effective sensemaking and sensegiving both organizational efficiency and eventually productivity would decrease.

An example to clarify the cruciality of sensemaking and sensegiving in organizations is the introduction of a new working hour registration app in a company. The CEOs intention is that this app should be used by all employees to register their working hours instead of handing them in on paper as it is currently done. The idea is to decrease paper usage and increase the digital way of working. To ensure the message is received by every single employee, the CEO asks the line managers to communicate it with their teams. Here, sensegiving occurs: While one line manager may understand the message from the CEO as "no one should use paper for working hour registration anymore", another line manager may interpret the same message as "we could use the app, but if we decide to declare our working hours on paper that is also fine". The employees in the team of the line managers then again make sense of the line manager's announcement by eventually adapting their behaviour.

The given example shows that two line managers could convey the CEO announcement in different ways. The line managers thus provide sensegiving to their teams differently. Thus, sensemaking and sensegiving have a dynamic relationship (Maitlis & Christianson, 2014). Both processes are interrelated and cannot exist without each other (Rouleau, 2005). According to Gioia and Chittipeddi (1991), sensemaking occurs bottom-up while sensegiving is a top-down process. Interestingly, sensemaking can happen at all organizational levels while sensegiving seems to be predetermined for upper management only (Gioia & Chittipeddi, 1991). Previous research on sensemaking and sensegiving also has mainly focused on the role of CEOs or upper management in the process of sensemaking and sensegiving while little attention was paid to the role of line managers. Line managers are the

employees "who work between the strategic apex and the operating core" (Wooldridge, 1994, as cited in Townsend & Hutchinson, 2017, p. 141) and consequently have a strategic key position within the organization (Sharma & Good, 2013). In the following, the line manager will be referred to as 'he'. This has nothing to do with the actual gender of the line manager and is simply a personally preferred writing style choice by the author. Line managers are further considered as a crucial actor for the implementation of HR practices in the organization (Bos-Nehles, Van Riemsdijk, and Looise, 2013; Guest & Bos-Nehles, 2013). For example, Logemann, Piekkari and Cornelissen (2019) studied the dual role of managers in the sensemaking and sensegiving process but did not pay specific attention to line managers. Likewise, Gioia and Chittipeddi (1991) only focused on the role of the CEO in the sensemaking and sensegiving process and also ignored the role of line managers.

However, line managers bridge the gap between the CEO and the operational core (Townsend & Hutchinson, 2017) and are thus crucial stakeholders in the implementation of organizational change (Sharma & Good, 2013). They "balance competing roles such as champions of strategy as well as recipients of change" (Sharma & Good, 2013, p. 99). Especially during organizational change related to digitalization line managers are not only required to provide a strategic vision but also to assist their employees with the digital implementation on an operational level (Khoreva, Bos-Nehles & Salojärvi, 2020). Digitalization is the process of "taking analogue information and encoding it into zeros and ones so that computers can store, process and transmit such information"<sup>1</sup>. The term digital refers to any kind of technology that "connects people and machines with each other or with information"<sup>2</sup>. Thus, assistance during digital implementation, as Khoreva et al. (2020) describe it, refers to the support organizational members can give to each other during the implementation of a new technology that aims at connecting organizational members and information by converting analogue information into data.

Though the role of sensemaking and sensegiving for line managers is understudied, one of the few studies on the role of line management in the sensemaking and sensegiving process was conducted by Shipton, Sanders, Atkinson and Frenkel (2015). The study stresses that overlooking the importance of the line manager's dual role could lead to negative organizational consequences such as low employee commitment (Shipton et al., 2015) or in case of digitalization to the unsuccessful implementation of a new technology. Fu, Flood, Rousseau and Morris (2018) and Shipton et al. (2015) confirm that line managers (in-)directly

<sup>&</sup>lt;sup>1</sup> Forbes (2018). Digitization, Digitalization, And Digital Transformation: Confuse Them At Your Peril. Retrieved on 28th july 2021 from https://www.forbes.com/sites/jasonbloomberg/2018/04/29/digitization-digitalization-and-digital-transformation-confuse-them-at-your-peril/?sh=198c028d2f2c.

<sup>&</sup>lt;sup>2</sup> Proventus digital (2020). What does digital really mean for your business? Retrieved on 28th july 2021 from https://www.proventus.ie/what-digital-really-means.

impact job- and team performance through their behaviour and encourage future research on the key role of line managers in organizations. Khoreva, Bos-Nehles and Salojärvi (2020) suggest that this future research on the line manager's role should focus on digitalization as it is a widely unexplored field regarding the sensemaking and sensegiving process of line managers.

The importance of the line manager also becomes clear in the previous example. While two line managers hear exactly the same message from the CEO they both can translate it differently to their teams. The way a line manager makes sense of the CEO's message is crucial for the sensegiving of that message to his team.

Current literature links sensemaking and sensegiving to (organizational) change (Balogun & Johnson, 2004; Maitlis, 2005; Maitlis & Christianson, 2014) but does not specifically focus on the dual role of line managers during digital organizational change. Obviously, organizational change that implies moving from analogue to digital ways of working has an effect on all organizational members. Nonetheless, line managers seem to be the most interesting ones to study in this situation as they are both in a managerial role and a part of a team and thus have a unique position in the organization (MacNeil, 2003). Especially during sensemaking and sensegiving this unique strategic position is an influential factor for the success of organizational change. Other organizational members, such as white-collar workers for example, have a less strategic position as they are either management or white-collar employees but rarely both at the same time. The role of line managers therefore enables researchers to study both management and employees at the same time by observing only one person.

Also, digitalization is one of the most acute topics of the 21<sup>st</sup> century. The term digital refers to the "conversion from mainly analogue information into the binary language understood by computers" (Hinings, Gegenhuber, & Greenwood, 2018, p. 52). Digitalization then is the process of introducing and implementing the change from the analogue way of working to the digital way of working. Semi-digital is a term that is used to describe a situation in which both analogue and digital items are combined. Not only the term digital is part of digitalization but so is the expression semi-digital: something is described as semi-digital when it can be used both digitally on a computer and in an analogue way printed out. Digital transformation can then occur when an organization has moved from being analogue and semi-digital to being fully digital; it describes the combined effects of several digital modernizations on an existing digital organizational system (Hinings et al., 2018).

While current studies such as the analysis by Shipton et al. (2015) do focus on the dual role of line managers in sensemaking and sensegiving they do not explicitly address

digitalization, even though it currently is the most common form of organizational change. It also seems that if digitalization is addressed in relation to sensemaking, then the focus is more on top management rather than on line managers, like in the study conducted by Gioa and Chittipeddi (1991). It seems as if the digitalization- and digital transformation literature focuses mostly on the strategic level decisions to digitalize. In case digitalization- and digital transformation literature focuses on the sensemaking of the 'why' behind the digitalization then the focus often lies on upper management: Homlund, Strandvik and Lähteenmäki (2017) for example did research on sensemaking during digitalization but similarly to Gioa and Chittipeddi (1991) only paid attention to upper management.

The little exploration of the line manager's role during digitalization is a problem because line manager's sensemaking and sensegiving is very influential to how the digitalization is perceived within the organization: it can either positively or negatively influence the success of the digital change (Sharma & Good, 2013; Khoreva et al., (2020). Especially in the early transition phase from analogue to digital, semi-digital organizational change, organizational members are often sceptical as it suggests a change in their current way of working and thus forces them to change habits (Kaz, Ilina and Medvedev, 2019). According to Dent and Goldberg (1999) this initial resistance mostly does not stem from the change itself but from the fears associated with it, for example the fear of losing one's job. Digitalization in itself often is a sensitive topic in organizations as individuals easily feel resistant towards the implementation of a new technology for example out of fear of being replaced or because the digitalization is unfamiliar to their earlier way of working and challenges their status quo (Goncalves & da Silva Goncalves, 2012). Semi-digital changes can thus be a careful first step towards more radical digitalization that enables organizational members getting used to moving from analogue to digital. Especially HR semi-digital changes are common as HR tools often are a combination of personal, analogue contact and digital procession of the analogue information into data (Azeem & Yasmin, 2016). The term HR tool describes "technological solutions that help organizations manage their day-to-day HR activities effectively" <sup>3</sup>.

Especially line managers are able to both strategically and operationally influence the sensemaking process of the digitalization through their way of giving sense to the digitalization (Khoreva et al., 2020; Goncalves & da Silva Goncalves, 2012). Ignoring the power of line managers in digitalization thus risks organizational failure or rejection of the digitalization and should therefore receive closer attention in future studies.

<sup>&</sup>lt;sup>3</sup> Kissflow (2020). The best Human Resource Management tools every company needs. Retrieved on 28th july 2021 from https://kissflow.com/hr/hr-management-tools-every-company-

needs/#:~:text=HR%20tools%20are%20the%20wide,to%2Dday%20HR%20activities%20effectively.&text=HR%2 0tools%20leverage%20the%20power,and%20manage%20their%20employees%20easily.

In the example given above, the introduction of the working hour registration app represents digitalization. It intends to replace the analogue way of registering working hours through paper. The language used by the CEO impacts the sensemaking of the line managers, in the sense that they might tell their teams to stop using paper or eventually allow them to use both the app and paper for working hour registration.

Interestingly, the study by Logemann et al. (2019) finds a link between used language and way of communication of (digital) change and the organizational sensemaking and sensegiving process. Individuals use so-called frames, "collectively constructed set of assumptions, knowledge and expectations" (Cornelissen & Werner, 2014, as cited by Klos & Spieht, 2020, p. 1), to connect communication of digitalization and their own sensemaking (Klos & Spieht, 2020). Especially during digitalization individuals make use of technological frames to place the new technology in personal and organizational context (Klos & Spieht, 2020). It seems as if sensemaking and sense jving during digitalization are closely linked to the use of different frames. According to Hamilton (2016), organizations can also influence their employees' sensemaking process of digitalization by aligning the organizational frame through which the transformation is communicated with the most common individual frame in the company. A frame consists of certain values and norms (Cornelissen & Werner, 2014). If the majority of employees in an organization identify with the frame that modernization is good and technology is an opportunity to increase performance, then digitalization is likely to be communicated as a positive innovation that makes the daily life of employees easier. Framing therefore is a form of sense jving and has the power to positively influence sense making (Hamilton, 2016). However, there is little to no literature on how line managers use frames for their own sensemaking and how these chosen frames again impact their own way of sensegiving during digitalization. By studying the line manager's use of frames and their impact on the sense jving process one could gain more insights into how an organization can actively impact the success of digitalization. This would be beneficial to organizations who seek to maximize the digitalization process as well as to researchers who want to understand the factors impacting the success of digitalization in organizations. Line managers equally represent both management and blue or white collar employees and thus have a strategic dual role as from their organizational position they have the power to influence the organizational processes both bottom-up and top-down. Focusing on line managers sensemaking and sensegiving during digitalization thus enables a more holistic viewpoint and also provides insights into both managerial- and operational points of views (MacNeil, 2003).

#### 1.1 Research proposition

There seem to be three main gaps in current sensemaking and sensegiving literature that require further consideration. First, little attention is paid to the dual role of line managers in the sensemaking and sensegiving process. Consequently, little is known about how their role affects the overall top-down/bottom-up process of organizational sensemaking and sensegiving. Leaving the dual role of line managers unexplored could lead to serious organizational problems since line managers are increasingly seen as holding an organizational key position (Fu et al., 2018; Shipton et al., 2015; Townsend & Hutchinson, 2017). Especially little is known about the impact of the line manager's personal sensemaking on his/her sensegiving process. Due to the importance of the line manager position to organizational success, it seems logical to further explore how a line manager's sensemaking process is linked to his/her way of sensegiving during digitalization.

Second, there is little to no research on the role of line managers during semidigitalization. This means that some research on the role of line managers during digitalization exists but it seems that only few studies focus on the transitional phase from analogue to digital, the semi-digital phase. Existing studies on the role of line managers in sensemaking and sensegiving mainly link the two processes to general organizational change and do not specifically address semi-digitalizations or digitalization in general. As digitalization becomes more and more integrated in organizational life, line managers will need to actively engage in it from the point of their organizational role. However, if little is known about how exactly line managers can be strategically positioned in digitalization then the likelihood of organizational failure is high.

Third, even though the processes of sensemaking and sensegiving are often mentioned together, more literature seems to exist on sensemaking than on sensegiving. A simple way to indicate this probability is to search for the terms sensemaking and sensegiving in Google Scholar: whereas sensemaking achieves 252.000 results, sensegiving achieves comparatively low 18.900 results. So, this study focuses especially on the sensegiving process of line managers as little is known in literature about it.

Consequently, these three literature gaps inspired the research question of this study: "how does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?". The goal of the study is to get a better understanding of the dual role of line managers in the sensemaking and sensegiving process of semi-digital change to make organizational change related to digitalization more predictable and effective. Thus, this study adds to the existing literature on both sensemaking and sensegiving as well as the existing literature on the dual role of line managers. By studying the dual organizational role in the implementation of a semi-digital HR tool this study also adds to existing digitalization literature.

#### 2. Theoretical framework

#### 2.1 Digitalization

The term digital refers to the "conversion from mainly analog information into the binary language understood by computers" (Hinings et al., 2018, p. 52). Digitalization then is the process of restructuring social life around "digital communication and media infrastructures"<sup>4</sup>. In organizations, digitalization could mean moving from analog to digital ways of working, for example by switching from face-to-face meetings to online meetings. A less radical way of digitalization is semi-digitalization. Here, the step from analog to digital has not been fully made yet: tools used can be both analog and digital, also referred to as semi-digital. Companies may use semi-digital tools as a starting point for further digitalization. Digital transformation then describes the joint effects of multiple digital modernisations on existing systems (Hinings et al., 2018) or in other words: what happens to existing organizational practises, employee relationships or unwritten organizational rules when a new technology is introduced that alters the current way of working (Hinings et al., 2018).

Semi-digital HR tools can be a part of organizational digitalization. Most common, HR tools are technological gadgets or practices used to facilitate the daily HR practices. During digitalization HR tools focus on the support of the digitalization in the company, meaning that these HR tools help facilitate the implementation of the digitalization, for example in the form of explanatory videos for the employees about the purpose of the digitalization. In the implementation phase of digitalization semi-digital HR tools can smoothen the transition from analogue to digital as their nature of being half digital and half analogue provides the organizational members with a less sharp cut in their current ways of working. This is beneficial as research shows that rapidly changing the habits in terms of current ways of working in an organization can lead to resistance (Kaz et al., 2019).

#### 2.2 Sensemaking and sensegiving during digitalization

Sensemaking is the process of "how individuals and organizations give meaning to events" (Mills et al., 2010, p. 182; Maitlis, 2005; Weick, 1988; Balogun & Johnson, 2004). In academic literature, some argue this process is retrospective (Weick, 1988), some say it is social (Maitlis, 2005) and again others state that it is ongoing (Weick, Sutcliffe & Obstfeld, 2005; Weick, 1995). The fact all authors seem to agree upon is that sensemaking is dynamic (Maitlis & Christianson, 2014). Suitably, sensemaking occurs as a response to experienced chaos and consequently has the intention to bring back the order of an individual's world by interpreting

<sup>&</sup>lt;sup>4</sup> Wiley Online library (2016). Digitalization. Retrieved on 28th july 2021 from https://onlinelibrary.wiley.com/doi/abs/10.1002/9781118766804.wbiect111.

and placing the happenings in the individual's context of similar past experiences (Maitlis & Christianson, 2014; Maitlis, 2005; Weick et al., 2005; Mills et al., 2010). Digitalization can be such a trigger for sensemaking.

Therefore, digitalization is linked to organizational change (Hinings et al., 2018). During digitalization, sensemaking is the way in which an individual responds to for example a new technology. It is about interpreting the digitalization in a systematic way based upon presumptions (Weick et al., 2005). Bartunek and Moch (1987) explained that digitalization in an organization can be scaled into first, second and third order technological change. First order technological changes are alterations made in the organization that slightly improve existing processes, for example in terms of efficiency (Bartunek & Moch, 1987). The introduction of a semi-digital tool can be such a first order technological change. In second order technological changes, the technology replaces existing processes (Bartunek & Moch, 1987). The intention behind the replacement is not essentially the wish to increase productivity or lower costs but rather to change the current way of working (Bartunek & Moch, 1987). Third order technological changes are even more radical changes of current processes, for example the use of artificial intelligence as support for the employees in the introduction of second order technological changes (Bartunek & Moch, 1987). If an individual is likely to mistrust technology, then the first sensemaking reaction towards a semi-digital tool or a full digitalization would be scepticism. Sensemaking therefore occurs "whenever the current state of the world is perceived to be different from the expected state of the world" (Weick et al., 2005, p. 414).

According to Gioia and Chittipeddi (1991), sensemaking occurs bottom-up, starting at the organizational stakeholders, and moving up the organizational ladder towards top management. Sensegiving on the other hand is top-down, starting at top management and moving down the organizational ladder towards the employees (Gioia & Chittipeddi, 1991). Interestingly, sensemaking can be influenced by all levels, but sensegiving cannot (Gioia & Chittipeddi, 1991). According to Maitlis and Christianson (2014), sensemaking is a social multilevel process that can happen at all organizational levels, while sensegiving is a one-way street (Gioia & Chittipeddi, 1991). Figure 1 below shows the organizational process of sensemaking and sensegiving according to Gioia and Chittipeddi (1991).



Figure 1: Process of sensemaking and sensegiving (Gioa & Chittipeddi, 1991)

However, from the model of Gioia and Chittipeddi (1991) it seems as if sensegiving only occurs top-down, which suggests that sensegiving in an organization is something only upper management has access to. However, as organizational literature starts to focus more on the role of line management in the process of sensemaking and sensegiving, this model seems slightly outdated. Therefore, in the following the dual role of line managers is outlined to propose an eventual adjustment in the model of Gioia and Chittipeddi (1991).

#### 2.3 Using frames for both sensemaking and sensegiving

A way in which individuals make sense of for example digitalization is through frames (Bondarouk, Bos-Nehles, & Hesselink, 2016). Frames are a set of "assumptions, meanings, knowledge, and expectations" (Orlikowski & Gash, 1992, p.3) that individuals use to comprehend the nature and role of something in their environment. According to Davidson and Pai (2004), frames exist on both an individual and on an organizational level. On an individual level, frames are used "to make sense of changes and develop new interpretations that inform their behaviour in response" (Bondarouk, Bos-Nehles, & Hesselink, 2016, p. 4). On an organizational level frames then may represent the view of the organization on for example a digitalization or a semi-digital tool (Klos & Spieht, 2020). During digitalization individuals often use technological frames to make sense (Orlikowski & Gash, 1992). Technological frames are "assumptions, meanings, knowledge, and expectations" (Orlikowski & Gash, 1992, p.3) about a technology and its potential usefulness, purpose and function in an organization (Klos & Spieht, 2020). Overall, 'technological frames provide a flexible approach to explore interpretive issues in information technology design, implementation, and

use' (Davidson & Pai, 2004, p. 484). Next to technological frames, individuals also use personal past experiences to make sense (Weick, 1995). These personal past experiences are called cognitive frames (Bondarouk et al., 2016). Cognitive frames reflect an individual's personal opinions and values and thus influence the way in which this person makes sense of a situation (Bondarouk et al., 2016; Mills, Thurlow & Mills, 2010; Weick, 1995). Consequently, during the process of sensemaking individuals focus mainly on cues which they extract from the situation based upon their past experiences, their cognitive frames, which can lead to the fact that two people totally differently make sense of the same situation (Bondarouk et al., 2010; Weick, 1995).

Frames are also part of sensegiving, which is another process related to sensemaking (Rouleau, 2005; Maitlis & Christianson, 2014). Sense jving is the "sequential and reciprocal process" (Hope, 2010, p. 197) of individuals interpreting a situation and communicating their thoughts about it with peers (Rouleau, 2005). Sense giving is the way in which digitalization is communicated in the organization. Here, frames are used on an organizational level (Klos & Spieht, 2020). A potential pitfall in the process of sense jving during digitalization is the misalignment between organizational and individual frames (Bondarouk et al., 2016). In case an individual frame and the organizational frame do not align one speaks of incongruent frames (Klos & Spieht, 2020). Such incongruence may result in 'resistance, scepticism, and poor appropriation of IT' (Davidson & Pai, 2004, p. 475) and thus should be prevented. In case incongruence is overcome through an intervention one speaks of frame alignment (Davidson & Pai 2004). Frame change occurs when an individual starts using a different frame after recognizing an incongruence between organizational individual frames (Davidson & Pai, 2004). Individuals who acknowledge and act upon the differences in individual and organizational frames are more likely to be more efficient project leaders and change agents compared to individuals who deny and ignore such incongruences (Klos & Spieht, 2020). Frame change is an example of how the sense jving process works. The purpose of sensegiving is to influence the sensemaking of others towards a favoured redirection of the situation (Gioia & Chittipeddi, 1991; Maitlis et al., 2010). However, if the frames used to give sense to the digital change do not align with the majority of the individual frames in the organization then the sensemaking process is likely to be misaligned with the intentions of the digitalization (Bondarouk et al., 2016). A very common way in which sense giving takes place is via language (Stensaker et al., 2008). For example, the companies chosen words to communicate digitalization impact the way in which employees react to the transformation as they all have personal associations with these words based on their cognitive frames (Stensaker et al., 2008; Bondarouk et al., 2016).

The combination of the frame theory and the sensemaking/sensegiving theory offers insights into how the two theories can enrich each other. The sensemaking and sensegiving

theory focuses on the process of the action rather than on the product it creates (Maitlis & Christianson, 2014; Gioia & Chittipeddi, 1991). The frame theory on the other hand assumes that frames are a product of a previous process (Bondarouk et al., 2016). By combining both the frame and sensemaking and sensegiving theory all theories are approached more holistically and both process and product are explored. Looking at the sensemaking and sensegiving processes are influenced by a person's viewpoint and assumptions - frames - and vice versa the sensemaking and sensegiving theory could point out how frames could change throughout the process of organizational digitalization.

#### 2.4 Dual role of line managers during digitalization

The sensemaking process of line managers indirectly affects the sensemaking process of other employees who are in a 'lower' organizational position than the line managers (Rouleau & Balogun, 2011). So, line managers have to both deliver the instructions of top-management and simultaneously can influence the way in which these instructions find the other employees (Townsend & Hutchinson, 2017). This makes the role of line managers relevant to study as it provides both insight into the viewpoint of a manager as it does into the viewpoint of either blue or white collar workers. Focusing on line managers rather than on upper management or blue or white collar workers alone thus is more efficient as it combines two groups in one role.

During digitalization, this means that line managers are both strategically and operationally invested (Khoreva, Bos-Nehles and Salojärvi, 2020). Therefore, they are "in the position to influence the majority of employees to strengthen or weaken strategy and policy" (Townsend & Hutchinson, 2017, p. 142) regarding digitalization. The features of a new technology that trigger sensemaking function as the basis for the sensegiving process of the line manager as it impacts how he comes to understand the technology and thus makes sense of it (Griffith, 1999). A line manager makes sense of the perceived usefulness of the new technology and perceived ease of use (Davis, 1989). Both categories then impact the sensegiving of the line manager about the digitalization.

Generally, line managers thus face the struggle of not only being employees but also managers and consequently have a dual role in the sensemaking and sensegiving process (Townsend & Hutchinson, 2017; Sharma & Good, 2013). They find themselves in the position of "recipients of change as much as implementers' (Balogun & Johnson, 2004, p. 523). There are various ways in which this can happen, for example through both formal and informal spoken- and written language (Balogun & Johnson, 2004; Stensaker et al., 2008). Clearly, line managers seem to have a significant role in the sensemaking process of employees (Shipton et al., 2015; Sharma & Good, 2013; Fu et al., 2018) which is why they should be included in the model of Gioia & Chittipeddi from 1991. If the important strategic role of line managers is

ignored serious organizational consequences such as low employee commitment or turnover could follow (Shipton et al., 2015). Based upon these theoretical insights a research model to study the dual role of line managers during digitalization is defined in figure 2 in the chapter below.

#### 2.4 Theoretical research model

Based upon the theoretical insights, the following research model is developed.



Figure 2: Research Model

The dual role of line managers during digitalization is central to this research. The research model clarifies that the aim of this study is to identify how the line manager's personal sensemaking process impacts the way in which the line manager gives sense to the digitalization.

#### 3. Methodology

This study used qualitative research methods to answer the question "how does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?". The choice to conduct qualitative research was based upon the fact that it allows room for variety, flexibility and spontaneity (Le & Schmid, 2020), which was considered helpful in measuring a latent process such as sensemaking and sensegiving.

This research was conducted at one company and therefore is a single case study. Single case studies often lead to strong internal validity and legitimacy for the generalizability of the research results (Lobo, Moeyaert, Baraldi Cunha, & Babik, 2017). The reason why this research was conducted as a single case study is due to limited time and resources. Because of this the choice was made to focus on all available resources of one company with the aim to conduct an in-depth qualitative research. The effect of the line manager's personal sensemaking process on his sensegiving process in relation to a digitalization seemed a suitable topic for in-depth qualitative research at one company. This is because analysing various line managers and their sensemaking and sensegiving process during digitalization is a dynamic investigation. Therefore, opting for the stable context of only one single organization seemed to allow more internal reliability as the external factors, such as organizational environment, were the same for the whole sample (Lobo et al., 2017). Consequently, the research context of this single case study was one company which had recently introduced a semi-digital HR tool in which the dual role of line managers was emphasized.

#### 3.1 Organizational research context

The Dutch construction company "Construct" (company name was changed to this fictitious name due to privacy reasons) in the region Twente in the Netherlands matched the research criteria as it had recently introduced a new way of inventorying skills in the form a semi-digital skillmatrix, a semi-digital HR tool, which required it's skillgroup coordinators – a line management function – to evaluate themselves and peer skillgroup members by making sense of the skillmatrix themselves and then translating it towards their peers. The company itself referred to the semi-digital HR tool as digital transformation or simply transformation, which is why in the coding section the first order code (digital) transformation was used instead of semi-digital HR tool. In the following, the organizational context is briefly outlined.

#### 3.1.1 Construct

Construct is part of the national Construct Group, which was founded in 1955 as a family company in the Netherlands. Construct is one of the five construction and real estate divisions the Construct Group has and thus focuses on both residential- and utility construction. Construct currently has roughly 360 employees, of which around 190 work in a white-collar position and around 170 as blue-collar construction workers. The company's vision is to create long-term value and sustainable relationships with its clients, employees and partners by the core values of safety, quality and reliability.

Construct is divided into nine streams according to the Japanese LEAN principle. This entails that the company is organized in nine multi disciplined project teams with an overarching staff core. The staff core is composed of the secretariat and facility department, the LEAN and HR department, the marketing and communication branch as well as financial services, the digitalization department and product development. The nine streams are assigned a colour, which is part of the Japanese LEAN principle. Within the nine streams, a distinction is made between residential construction and utility construction. Therefore, the residential construction part of Construct consists of six streams (the red stream, blue stream, green stream, purple stream, yellow stream and white stream) while the utility part consists of two streams (the grey stream and orange stream). Both residential- and utility divisions are

split into four process phases for which each stream is responsible. These are customer and market, preparation, production and service and aftercare. While all streams are responsible for the first three process phases, the ninth stream (black stream) alone is responsible for the service and aftercare of both residential- and utility construction. Within Construct, there are 27 work fields (called 'skillgroups') and 23 skillgroup coordinators who are responsible for coordinating the different skillgroup members across the streams. The company's blue-collar workers do not fall into skillgroups, only white-collar employees. Construct is continuously expanding and consequently also the number of employees rapidly increases. As the skillgroups work remotely across the streams, Construct felt the urge to visualize available skills, competencies and overall craftsmanship per skillgroup more in a digital way. Therefore, the company introduced the skillmatrix. The skillmatrix is a semi-digital HR tool that is part of a bigger digitalization process and therefore seemed suitable for this research.

#### 3.1.2 Skillmatrix

In the beginning of 2020, Construct introduced a new semi-digital tool that enables the inventorying of craftsmanship: the skillmatrix. The skillmatrix is an online Excel document which is intended to be used in every skillgroup to inventory the skills present within the skillgroup. The skillmatrix is a semi-digital tool that can be used both analougly as well as fully digital. It is part of a larger digitalization process, as Construct aims at introducing a digital craftsmanship platform through which analog skill determinations and evaluations eventually would become obsolete. The introduction of the semi-digital skillmatrix is the first step towards this full digitalization. Due to the fact that the skillgroup members often work remotely in the different streams, Construct felt the urge to allocate the skills of each skillgroup more easily in order to enable the skillgroup members to cooperate more smoothly. The skillmatrix was thought to also be used to allocate training and developments in each skillgroup more easily and to check whether potential employee candidates meet all the skill requirements a skillgroup team currently needs. The intention of the skillmatrix is not to create competition and evaluation in the skillgroups but simply to make the present craftsmanship per skillgroup more known and optically visible to the skillgroup. Therefore, the skillmatrix is a semi-digital HR tool. It is a new way, a transformation, of allocating skills and competencies within the company that also allows for detection of potential training needs. For example, one employee may be very proficient with Excel whereas another is less advanced. As this would be made visible in the skillmatrix the less advanced employee would know whom of his colleagues to ask for advice on Excel. Before the skillmatrix, there was no such system in place at Construct. As it is not mandatory to digitally use the skillmatrix it can be categorized as a so-called 'semi digital' transformation.

The skillmatrix consists of function specific skills and -competencies as well as organization specific skills and -competencies. The latter are pre-defined by HR. The function specific skills and competencies however are up to the skillgroup. It is up to the skillgroup coordinator to either individually think of the function specific skills and -competencies or collectively brainstorm about it with the whole skillgroup. All competencies can be scored from level one (beginner) to level four (full professional) and all skills can be ranked from zero to four with zero being "not present" and four being "can give training in this skill". An example of the skillmatrix can be found in appendix one.

The introduction of the skillmatrix at Construct is impeccable for this research as it matches the theoretical insights from chapter two and allows for studying the research question "how does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?" in an organizational context in the following ways: It is the job of the skillgroup coordinator to give sense to the skillmatrix and then translate it to his skillgroup members. At the same time, the skillgroup coordinator is also part of the skillmatrix himself and needs to be scored on it as well. Therefore, the skillgroup coordinator overtakes the earlier theorized dual role of line manager who has to both make sense of and give sense during the digitalization. The digitalization in this context is the introduction of the skillmatrix as a new semi-digital tool. It is not a full digitalization yet but a transition from an analogue protocol towards a digital inventory with the aim of becoming fully digital in the future, which makes it in essence a semi-digital HR tool. Translated into the research model from chapter two, the research context looks as follows:



Figure 3: Research model in context

#### 3.1.3 Research population and sample

Consequently, the population of this research are all skillgroup coordinators and skillgroup members at Construct, so basically all 190 white-collar employees.

The sample size of this research however amounts to 14 Construct employees: four skillgroup coordinators as well as two skillgroup members per skillgroup coordinator and two

additional other stakeholders from HR and the LEAN department. Due to privacy reasons the research data are anonymised. Thus, the skillgroup coordinators are referred to as LM1, LM2, LM3 and LM4. LM is an abbreviation of the word line manager. The skillgroup members are referred to as SM1, SM2, SM3, SM4, SM5, SM6, SM7 and SM8. SM is an abbreviation of the word skillgroup member. The other stakeholders are referred to as OS1 and OS2. OS is an abbreviation of the word other stakeholder. Table 1 below shows which LM belongs to which SM in this research.

LM1	SM6
	SM8
LM2	SM3
	SM4
LM3	SM2
	SM5
LM4	SM1
	SM7
OS1	
OS2	

Table 1: Overview match LM and SM

The sample size choice is based upon two assumptions: First, due to time issues and organizational resistance it is unrealistic to interview 100% of the population, which would be 27 skillgroup coordinators and around approximately 10 skillgroup members per discipline on average. Due to the fact that the skillmatrix has not been introduced in all 27 skillgroups yet, the four skillgroups in which the skillmatrix already is fully implemented, meaning that the skillmatrix has been autonomously used by the skillgroups after its introduction, were chosen. Second, for qualitative research with a relatively homogenous population, such as the population of this study, a minimum of 12 cases with saturated data is regarded as reliable and valid (Boddy, 2016). As this research is more in-depth research instead of a positivist study, interviewing one single skillgroup coordinator and one skillgroup member would already

be enough (Boddy, 2016). However, to increase the validity and generalizability of this study, interviewing more than the minimum required amount of skillgroup coordinators and skillgroup members as well as additional stakeholders seemed logical.

The respondents of this study were selected based upon the following two criteria: First of all, the respondents minimum length of employment at the company should be no less than three years. The reason for that is that the introduction of the semi-digital HR tool took place roughly two years ago from when this study was conducted. The minimum employment length of three years for all respondents ensured that the interviewed employees had a feeling for how the company was before the introduction of the semi-digital HR tool took place. Secondly, all respondents should have completed the introduction of the semi-digital HR tool as this study asks the respondents to reflect on their experience with it.

#### 3.2 Qualitative research

To research how the sensemaking process of the line manager affects his sensegiving process during the introduction of a semi-digital HR tool qualitative research is used. The qualitative research method used in this study is semi-structured interviews.

In the following, some code trees in the chapter below contain the acronyms 'VC' and 'VL'. VC is the Dutch abbreviation for LM and VL is the Dutch abbreviation for SM. The reason why these abbreviations are kept in Dutch is because the interviews were conducted in Dutch and consequently some coding was done in Dutch as well.

#### 3.2.1 Semi-structured interviews

In total 14 semi-structured interviews are conducted for this research: four semi-structured interviews with skillgroup coordinators as well as a semi-structured interview with two skillgroup members per skillgroup coordinator and two interviews with other organizational stakeholders who were actively involved in the skillmatrix introduction process.

The choice for semi-structured interviews as this study's research method is based upon the fact that it is a combination of flexibility and standardization which enables maximum answer capacity and interpretability of the answers within the sample (Wilson, 2012). Next to being semi-structured, the interviews are also phenomenological, which means that mainly open-ended questions are used (Roulston, 2018). This shall have the effect that the most detailed answers possible are received which then allow for follow-up questions to gain additional in-depth knowledge (Roulston, 2018).

Besides semi-structured interviews, organizational artifacts such as observational notes and collected archival material in the form of emails and memos are used as input data to allow a profound and 360-degree angle on the research topic (Locke, Feldman, & Golden-

Biddle, 2020). The aim of the interview analysis is to identify whether there is a pattern between the personal sensemaking and sensegiving of the line manager and the sensemaking of the team member of the line manager.

#### 3.2.2 Transcription and inductive coding

After conducting the 14 interviews they were transcribed with the help of the software Amberscript. In total, the transcriptions of the 14 interviews amounted to 132 pages in fond size 11 with 1.15 line space. Next, the transcripts were uploaded in the coding software Atlas.ti. Here, the transcripts were inductively coded. Inductive coding entails that within the transcribed interviews first codes are defined and later put together as a pattern to identify underlying commonalities and systematics (Locke et al., 2020). Inductive coding allows for immediate interpretation into themes and underlying concepts which make the interviews easier to understand in the research context (Roulston, 2018). The codes were defined into first, second, third and sometimes even fourth order themes (Gioia & Chittipeddi, 1991) to identify the underlying frames the discipline coordinates use to make sense themselves and then give sense to their discipline members regarding the skillmatrix. Subsequently, a data structure was built that summarized and visualized the identified first, second, third and sometimes. The data structure allowed them to group into aggregate dimensions which provide insight into underlying patterns of sensemaking and sensegiving of the discipline coordinates related to the semi-digital HR tool (Gioia, Corley & Hamilton, 2012).

#### 3.2.3 Codes

In this study, a total of 137 codes were used. The codes were categorized into first-, second-, third- and sometimes also fourth order categories. The first order codes are (digital) transformation, resistance, sensemaking of the skillmatrix itself, sensemaking of the skillmatrix process, status of the LM and LM sensegiving of the skillmatrix. These code categories are based upon the theoretical insights of chapter two and aim at providing the most profound insights into the different sensemaking and sensegiving processes of the interviewees that also allow for optimal comparison between LM and LM to identify possible connections. Below a detailed description is given about the second, third and fourth rank of each of these seven first order categories.

#### 3.2.3.1 (Digital) transformation

First order code (digital) transformation aims at exploring the attitude of the interviewees towards change and digitalization. The second order codes of this first order code category are attitude towards digital transformation, experience with digital transformation, skillmatrix as digital transformation and technological frame. The second order code attitude

towards digital transformation is split into the third order codes negative attitude, positive attitude and neutral attitude. The second order code experience with digital transformation is split into the third order codes negative experience and positive experience.



Figure 5: (digital) transformation code categories

#### 3.2.3.2 Resistance

The first order code **resistance** aims at exploring the different forms of resistance towards the skillmatrix among the interviewees. It is split into three second order codes: resistance, efforts to overcome resistance and scepticism.

The second order code resistance again is divided into six third order codes which are: no resistance, resistance to competencies within skillmatrix, resistance to proposed way of filling in the skillmatrix, fear of being held accountable or judged for the skillmatrix scores, VC anticipation of the resistance upfront and overall resistance. Third order code 'fear of being held accountable oir judged for skillmatrix scores' has a fourth order code, which is 'fear of what skillmatrix scores might be used for'.

Next, the second order code 'efforts to overcome resistance' contains seven third and three fourth order codes. The third order codes are: show understanding, change initial strategy to fill in skillmatrix, explain the purpose of the skillmatrix in-depth, actively ask questions, give room for suggestions, reassuring the privacy of the skillmatrix and opportunity to voice one's opinion about the skillmatrix. Third order code 'show understanding' contains a fourth order code, which is 'accept that changes take time'. Third order code 'change initial strategy to fill in skillmatrix' as well contains two fourth order codes, namely 'filling in individually instead with the whole group' and 'anonymise filled-in scores'.

Also, the second order code 'scepsism' contains six third order codes, which are scepticism about what the skillmatrix would be used for, scepticism about the content of the skillmatrix, scepticism that the skillmatrix would be used to judge employees, scepticism about the subjective nature of the skillmatrix, scepticism that the skillmatrix is just another organizational tool and scepticism because origin of the skillmatrix was unknown.



#### 3.2.3.3 Sensemaking of the skillmatrix itself

The first order code **sensemaking of the skillmatrix itself** is divided into seven second order codes: *initial attitude towards the skillmatrix, attitude towards skillmatrix after further elaboration, definition of the skillmatrix, unclarity about the skillmatrix, experience filling in the skillmatrix, perceived origin of the skillmatrix and future vision of skillmatrix.* 

Second order code 'initial attitude towards the skillmatrix' is split into three third order codes, namely 'initial attitude towards skillmatrix = scepticism', 'skillmatrix is introduced to create more transparency' and 'shift from initial scepticism to understanding and approving the skillmatrix after further elaboration'. The latter third order code is also associated with the second order code 'attitude towards skillmatrix after further elaboration'. The latter third order code is also associated with the second order code 'attitude towards skillmatrix after further elaboration'. The third order code 'initial attitude towards skillmatrix after further elaboration'. The third order code 'initial attitude towards skillmatrix is organizational control mechanism, scepticism that skillmatrix is measurement scale, scepticism that skillmatrix is employee grading mechanism, scepticism about skillmatrix encouraging competition within skillgroup, scepticism that skillmatrix is just another HR tool, scepticism about the purpose of the skillmatrix and general distrust in skillmatrix.

Additionally, the second order code 'attitude towards the skillmatrix after further elaboration' is split into three third order coes, namely 'still sceptical', 'positive attitude after further elaboration' and 'skillmatrix is less black/white, neutral about it'. The third order theme 'still sceptical' then again contains four fourth order codes: still sceptical that skillmatrix is used as a grading mechanism, still sceptical about the purpose of the skillmatrix, skillmatrix is very subjective and skillmatrix is theoretical, little practical added value. Similarly, the third order code 'positive attitude after further elaboration' hosts seven fourth order codes. These are: skillmatrix as well thought-through model, realization that skillmatrix has added value to skillgroup, skillmatrix is not a grading mechanism, skillmatrix creates conversation material, skillmatrix is useful to make potential visible, organization needs to change more in maintenance of skillmatrix and skillmatrix has low priority within skillgroup.

Also, the second order code 'definition of skillmatrix' is split into eight third order codes, one of these third order codes hoisting a fourth order code. These third order codes of 'definition of skillmatrix' are: skill inventory, measurement scale, zero measurement, tool, guideline, means of securing craftsmanship, visualization of the skillgroups craftsmanship and instrument. Related to the third order code 'tool' is the fourth order code 'tool to inventory training needs'.

The second order code 'unclarity about skillmatrix' has two third order sub-codes. These are 'unclarity about how to fill in the skillmatrix, individually or as a group' and unclarity about the purpose of the skillmatrix.

Moreover, the second order code 'experience filling in the skillmatrix' is split into three third order codes, namely: difficulties with grading colleagues, filling in skillmatrix individually and filling in the skillmatrix as a group.

The second order code perceived origin of the skillmatrix also has three third order codes: further development of an already existing Construct document, skillmatrix origin lies outside Construct and skillmatrix as Construct thing.



Figure 7: sensemaking of the skillmatrix itself codes

#### 3.2.3.4 Sensemaking of the skillmatrix process

The first order code **sensemaking of the skillmatrix process** is divided into seven second order codes, which are: *understanding of the skillmatrix process, experienced impact of the skillmatrix, organizational communication process of the skillmatrix, experience filling in the skillmatrix, suggestions for improvement in skillmatrix process, perceived role of HR and current status of the skillmatrix.* Some of these second order codes also host third order codes.

One second order code that is split into third order codes is 'understanding of the skillmatrix process'. It has seven third order codes, which are: first presenting own ideas to SM and then asking for input, together thinking of input for skillmatrix, SM first heard of skillmatrix from LM, further elaboration skillmatrix after initial announcement LM by LEAN/HR, how to actually fill in the skillmatrix, initiative of LM to communicate skillmatrix with skillgroup comes from HR and experienced differences between skillgroup sensemaking.

Another second order code hosting third order codes is 'experienced impact of the skillmatrix'. Third order sub-codes are 'no experienced impact', skillmatrix positively enables conversation in skillgroup and results/output of skillmatrix.

Additionally, the second order code 'suggestions for improvement skillmatrix process' has seven third order sub-codes. There are: satisfaction with skillmatrix process, include employees in designing skillmatrix process, content improvements of skillmatrix, make skillmatrix more digital, design the implementation of the skillmatrix differently, take the already existing tools more into account when designing the skillmatrix and make the future use of the skillmatrix more clear.

Lastly, the second order code 'perceived role of HR' also hosts three third order codes, namely: HR as assistant in skillmatrix process, HR as owner of the skillmatrix and HR should have facilitated more.



Figure 8: sensemaking of the skillmatrix process codes

#### 3.2.3.5 Status of the LM

The first order code **status of the LM** is subdivided into one second order code, which is 'status LM', four third order codes and two fourth order codes. The third order codes are: LM as part of skillgroup, LM as part of hierarchy, importance of LM role in skillmatrix process and good contact between LM and SM.

The third order code 'importance of LM role in skillmatrix process' is split into two fourth order codes, namely 'LM as initiator/co-founder of skillmatrix' and 'LM as owner of the skillmatrix'.



#### 3.2.3.6 LM sensegiving of skillmatrix

The first order code **LM sensegiving of skillmatrix** is divided into one second order code, which is *LM sensegiving efforts*, and five third order codes.

The third order codes consist of: first presenting own ideas to SM and then asking for input, together thinking of input for the skillmatrix, active sensegiving, passive sensegiving and communicated intention of skillmatrix by LM.



Figure 10: LM sensegiving of skillmatrix

#### 3.2.4 Analysis procedure

In order to find out how a line manager's personal sensemaking process influences his sensegiving procedure in the implementation of a semi-digital HR tool, the analysis part looks to find relationships between the answers of the skillgroup coordinator (LM) and the skillgroup members (SM). Based upon the different orders of codes a detailed analysis takes place with emphasis on researching in what way the skillgroup coordinators personal beliefs influence

his or her sensgiving efforts and thus the sensemaking of the skillgroup members. Beforehand, the findings are stated.

#### 4. Findings

#### 4.1 Line managers personal sensemaking process

#### 4.1.1 Defining the semi-digital HR tool as digital transformation

First of all, whether or not the line manager views the semi-digital HR tool as an actual digitalization or even digital transformation seems to impact his satisfaction with the organizational implementation process. In this study, only one of the four line managers defined the digitalization occurring at the company as a digital transformation, with the consequence that this line manager was the only one who was totally satisfied with the introduction process of the semi-digital HR tool, as can be seen in the following quote:

"Overall I find it quite a well working model. You could probably do it differently but I don't see how (...) I think the process went well and it was clearly and openly communicated about it" (LM1).

In contrast, the other three line managers who did not define the change as digital transformation all mentioned several suggestions for improvement in the introduction process of the semi-digital HR tool. It could be that the sensegiving process of these line managers is influenced by this misalignment between personal and organizational definition of the semi-digital HR tool, as the organization did define the semi-digital HR tool as a digital transformation. Mostly, the suggestions of the line managers evolved around involving the line managers more in the implementation process and communicating about the semi-digital HR tool more holistically, as the following quotes show:

"You could involve the skillgroup coordinators more in the development of it" (LM2)

*"If I were to do it again now then I would definitely inform the skillgroup coordinator and skillgroup members altogether per level" (LM4)* 

So, one could argue that if the line manager understands the nature of the change correctly then the line manager is more likely to view the organizational processes around the digitalization in perspective and accept the organizational steps taken in the implementation of that digitalization.

#### 4.1.2 Turning scepticism into acceptance

It seems that a line manager's initial scepticism towards the semi-digital HR tool can partially be solved by further elaboration and actual application of the semi-digital HR tool.

In this study, initially all four line managers displayed scepticism towards the semidigital HR tool. The scepticism mainly concerned the origin of the semi-digital HR tool and the purpose behind it, as reflected by the following quotes:

"My first thought was what is this about?" (LM3)

"My first thought was what is this going to be used for?" (LM4)

*"I didn't really know what the meaning behind the skillmatrix was" (LM2)* 

In addition, some of the line managers also were sceptical that the semi-digital tool would be *"another list on top of all the others" (LM3)* or that it *"was really an HR solution" (LM2)*. However, after further elaboration and actual usage of the the semi-digital tool by the line managers, half of them saw the added value of it, as the following quotes display:

*"When I first used the skillmatrix during evaluation talks I noticed its added value" (LM2)* 

"You can do so much more with it than we initially thought" (LM4)

Nonetheless, the line manager's personal view on organizational change in general also seems to impact the line manager's trust in the digitalization, as the following quote suggests:

"I am by nature slightly distrustful. So when it was said that the skillmatrix was not intended to judge or evaluate someone I thought to myself 'you can say that but I'm not believing it' " (LM1)

Another line manager states that the scepticism after further elaboration is rooted in the fact that the semi-digital tool is not perceived to directly influence the job performance and thus is only seen as an extra burden as the following quote shows:

#### "Overall, it only cost us a lot of time" (LM3).

Consequently, it seems that line managers are more willing to accept the semi-digital tool if they think that it directly adds value to their daily performance on the job. The following quote provides evidence for this thought: *"It helps lifting up your skillgroup to a certain level and to allocate where everyone stands in terms of skills and whether someone needs help with something" (LM4)* 

In this study, the line managers who indicate that the semi-digital HR tool adds value are also the ones that already used the tool. The other two line managers who remain sceptical about the skillmatrix after further elaboration both did not practically apply the semi-digital HR tool after having filled it in for the first time:

"I haven't done anything with the skillmatrix in the past year" (LM3)

#### "We thought of it more as a one time thing" (LM1)

It thus seems that the likelihood of staying sceptical about the semi-digital HR tool even after further explanation also depends on whether or not the line manager actively used the tool again after its first introduction. It seems that the likelihood of staying sceptical about the semi-digital HR tool is higher when the line manager has not practically used it yet. It also appears that when the line managers already used the tool they are more likely to see it's added value (*"it is really nice being able to see the learning process of it"* (LM4)), compared to when they did not use the tool after it was introduced (*"I'm inclined to say it is more of a theoretical story"* (LM1)).

#### 4.1.3 Accepting the organizational intention of the semi-digital HR tool

The line manager's agreement with the organizational intention of the semi-digital HR tool seems to be influenced by whether or not the line manager believes there is a necessity for the tool to exist:

In this study, all line managers seemed to understand the organizational intention. All line managers either believed that the semi-digital tool had the intention to visualize skills and competencies or give insight into the craftsmanship within the skillgroups. The communicated organizational intention was indeed *"to realize per skillgroup where the skillgroup's competencies are allocated" (OS1)*.

However, understanding the organizational intention does not necessarily equal acceptance of the intention. The followings quotes show that while all line managers did understand the intention of the semi-digital HR tool correctly, some voice their doubts about the necessity of it:

"As a skillgroup coordinator you're suddenly overwhelmed with the ideas when there is a reason for improvement. However, I didn't think there was one" (LM2)

*"the overview of competencies and such we already had in house. That was our old competency management system which has completely been ignored in this process" (LM3)* 

The acceptance of the organizational intention thus seems to be influenced by whether or not the line manager believes there is a necessity for change.

#### 4.1.4 Active vs. passive attributions to the semi-digital HR tool

It appears that line managers who felt personally involved in the development of the semidigital HR tool are more inclined to use active attributions to define the tool compared to line managers who were not involved in the development process.

In this study, even though all line manager's definitions of the semi-digital tool are in line with the organizational intention of the tool, some line managers defined it as a more practical item that could be actively used like a *"helping tool" (LM4)* or a *"measurement scale" (LM1)*, while other line managers defined it as a more passive item like a *"means of guarantee" (LM2)* or a *"scheme to monitor" (LM3)*.

It strikes that the line managers who view the semi-digital HR tool as an item that can actively be used are the ones that believe the skillmatrix is a further development of an already existing company document and were even somewhat involved in the development process of it, as the following quotes show:

"Back in the days we had all of that written on paper, so the skillmatrix is somewhat more in depth and a little easier maybe, because it is digital" (LM1)

*"I was involved in it. I think we were the first or second department that was put on foot for this to work on" (LM4)* 

The line managers referring to the semi-digital HR tool as a more passive item especially stress the fact of not being involved in the development process of it:

"I had no feeling at all of how the skillmatrix came to be in the first place" (LM2)

"We had our old competency management system which has been completely ignored in this process, I don't know why" (LM3)

#### 4.2 Line managers sensegiving process

#### 4.2.1 Active vs. passive sensegiving

Line managers have the choice to engage in either active or passive sensegiving. It seems that the choice for either active or passive sensegiving is related to the line manager's personal preference of being involved in the development of the semi-tool:

In this study, one line manager actively gave sense to the semi-digital tool by anticipating resistance in his team upfront. The following quote shows how:

"I think I talked about it four times in the skillgroup: First a little bit careful, sort of introducing it. (...) The next time I told a little bit more and (...) after approximately four times I dived into the actual content" (LM3)

Similarly, another line manager chose *"a very open conversation about it" (LM1)* as a way to give sense to the semi-digital tool. On the other hand, one line manager decided to not actively engage in the sensegiving process, as can be seen by the following quote:

#### "My role was clearly explained, only I chose not to take it" (LM2)

It even seems that the active decision to passively engage in the sense giving process is rooted in the personal preference of the line manager to be actively involved in the development process of the semi-digital tool, as the following quote suggests:

"I had no feeling at all of how the skillmatrix came to be" (LM2).

The passive sensegiving of the line manager even seems like a protest towards HR. The line manager claims that HR simply presented him with the semi-digital tool but did not involve him in the development of it. Consequently, this line manager lets HR overtake his active role in the sensegiving process, as the following quote indicates:

"I overtook the role of presenting the skillmatrix to the skillgroup but chose to let the implementation be a responsibility of HR" (LM2)

Interestingly, more line managers report not being actively involved in the development of the semi-digital tool but one line manager specifically in this study seems to be the only one that really minds it.

The choice to either actively or passively engage in sense giving therefore seems to be related to the personal preference of the line manager to be actively involved in the development of the semi-digital tool. It thus seems that line managers who did not feel involved in the development process of the semi-digital HR tool but have a personal preference for being involved in it are more likely to engage in passive sense giving compared to the line managers that feel actively involved in the development process of it.

#### 4.2.2 Active anticipation of opposition during sense giving reduces resistance

It seems that line managers who actively anticipate opposition during the sense giving process are more likely to effectively minimize resistance in their team compared to line managers who do not actively anticipate resistance during the sense giving process.

In this study for example, some line managers opted for a lengthy but smooth sense process as he feared resistance from the skillgroup, as the next quote displays:

"I expected resistance. If we start with something new and I push too quickly the resistance only grows. So if you can dice up the steps a bit you want to do that" (LM3)

Interestingly, the skillgroup members of these line managers report little to no experienced resistance and even compliment the line manager for the smooth introduction of the semidigital HR tool, as the upcoming quotes show

"I think he listened very well to the needs of the skillgroup" (SM5)

"Overall it went smooth: filling it in, put it together and then discussing it" (SM2)

This indicates that the lengthy sense jving process of this line manager probably had the hoped effect on the skillgroup, namely reducing resistance.

On the other hand, line managers who did not actively anticipate resistance upfront were more likely to be confronted with resistance towards the semi-digital tool in the skillgroup during the introduction process. Interestingly, in dealing with the unanticipated resistance some line managers overtook either an active sensegiving role (*"if you rule the group then you also need to let the group speak"* (*LM4*)) while other line managers overtook a passive sensegiving role (*"I was not the owner of it, HR was, so I sent all the questions to them"* (*LM2*)).

Also, it seems that when the line manager did not actively anticipate resistance and even overtook an overall passive role in the sensegiving process by outsourcing all tasks to HR, the resistance was solved more smoothly compared to when the line manager passively anticipated resistance but had an overall active role in the sensegiving process. One line manager for example actively engaged in sensegiving but did not actively anticipate resistance. That line manager's group however suggests that *"it would have been better if HR would just have told us, or an external company or simply someone that is not part of the skillgroup" (SM1)*. In comparison, another line manager overtook a passive role in the sensegiving process and neither actively anticipated resistance nor tried to actively resolve the resistance. Strikingly, the skillgroup members of this line manager report no clear descriptions of remembering resistance in the skillgroup and also report a clear view on who was in charge of the sensegiving process, as the next quote indicates:

### *"The lean manager really was in charge of the setting up and the implementation and the line manager then took it over" (SM4)*

Thus, especially the clear communication about the line manager's role during the sensegiving process seems to be of impact when it comes to reducing resistance. In fact, it seems that the more consistent a line manager chooses his roles during the sensegiving process the less resistance is experienced by his team. For example, if the line manager constantly chooses to overtake an active role it seems that resistance is likely to be less compared to when a line manager first actively gives sense and then passively anticipates resistance. It appears that line managers who actively anticipate resistance during their sensegiving process seem to have more success in reducing resistance compared to line managers who do not actively anticipate resistance and only actively try to solve it.

#### 4.2.3 Status line manager impacts level of dominance during sensegiving

The sense iving process of the line manager seems to also be influenced by the status the line manager attributes to himself: It seems that when the line manager attributes himself the status of being more part of the organizational hierarchy than being part of the team then the line manager is more likely to take the lead in the introduction of the semi-digital HR tool.

Some line managers positioned themselves as part of the hierarchy, as the following quote suggests:

#### *"If you rule the group then you also need to let the group speak" (LM4)*

These line managers often presented their already filled-in ideas about the competencies to include in the skillmatrix to the skillgroup instead of discussing the ideas together with the team, as the upcoming quote clarifies:

#### "I think I filled in the competencies in the skillmatrix mostly alone" (LM3)

Interestingly, other line managers saw themselves more as part of the skillgroup and also brainstormed together with their team about the input for the skillmatrix, as the next quote indicates:

"We had a very open conversation about it. (...) We really had a talk about which skills to include and what our levels in it were" (LM1)

Overall, it thus appears that the line manager is more likely to take a more authoritarian role in the sensegiving process when he positions himself slightly hierarchically above the skillgroup compared to when he positions himself as part of the team.

#### 4.2.4 Technological frame impacts view on semi-digital HR tool

The personal technological frame of the line manager seems to impact his view on the semidigital tool as such and also impacts how his team members view the tool.

Some line managers for example view digitalization and technology itself as 'cold', as the following quote shows:

"There is a part that is digital but that is also a cold world: you throw something over the fence and then it is gone" (LM4)

These line managers define the semi-digital tool as a transformation but not as a digital one. Interestingly, some team members share a similar technological frame that also stresses the effectiveness of semi-digital tool but also remarks on the little personal touch. Additionally they seem to regard the semi-digital tool as a transformation but not as a digital one as this quote indicates:

"In the end it saves us a lot of time. So more efficiency" (SM7)

"Yes, maybe a less big one. But I would not say it is a digital transformation" (SM7)

In contrast, another line manager overtakes the technological frame that technology and digitalization is good as long as everyone is able to keep up with it:

"I think it's fine, it helps us. But slowly, everyone needs to go along with it" (LM3)

*"It needs to be easily accessible, you should be able to discuss it and no one should feel ashamed to ask for further explanation" (LM3)* 

However, this line manager does not define the semi-digital HR tool as digital transformation as such and his team members share this view, as the upcoming quote shows:

"Well no, not really. You can fill it in with the knowledge you have, in that sense it is not really something new" (SM2)

It thus seems that because the line manager associates newness with digitalization he automatically does not view a semi-digital tool as part of the digitalization if it in his eyes does not add anything new. The team member seems to share that view, as the following quote suggests:

"No, I don't see it as a digitalization. Of course you can make it digital but it is not a digitalization" (SM5)

Consequently, it seems that the line manager's personal technological frame has an impact on whether or not he categorizes the semi-digital tool as actual digitalization. It then also seems that his sensegiving is somewhat conveying this attitude towards the team members as it seems that the technological frame with which the team members look at the digitalization is somewhat influenced by the line manager's perspective.

#### 4.3 Skillgroup members sensemaking process

#### 4.3.1 Effect of line manager's attitude towards the semi-digital tool on the team

It seems that the way in which the team of the line manager interprets the intention of the semi-digital HR tool is related to the line manager's personal attitude towards the tool.

One line manager for example is a bit sceptical towards the organizational change regarding the semi-digital HR tool as can be seen in the following quote:

"Normally, agreement was agreement. Now more and more agreements come to stand on paper and there sits a sort control function behind it, like checking whether or not you match the criteria the skillmatrix intend us to have" (LM4)

Interestingly, some team members report the following:

"People really thought the skillmatrix was intended to evaluate employees and a few colleagues also said something like we will be evaluated based upon that and when the time comes that someone has to leave (...) they are going to do that based on the skillmatrix" (SM7)

Similarly, another line manager voices scepticism about the intention of the semi-digital tool, as can be seen in the following quote:

"It was said that the skillmatrix was not intended to judge or evaluate someone but I thought: you can say that but I'm not believing it" (LM1)

Another team member reports that "people thought they were evaluated" (SM6).

Overall it thus seems as if the attitude of the line manager towards the intention behind the semi-digital HR tool has an effect on how the team members of the line manager view the tool.

#### 4.3.2 Smaller group, less resistance

The size of the line manager's team also seems to have an impact on the acceptance of the semi-digital HR tool as well as the level of resistance. The smaller the team of the line manager the more likely a closer connection between the line manager and his team and the less likely is resistance.

Whereas some line managers have a small team of only two team members, and reported that *"no one was negative about it" (LM1)*, other line managers with a bigger team reported that *"there definitely was resistance" (LM3)* regarding the semi-digital HR tool.

Not only the group size but also the perceived role of the line manager by the team members seemed to have an effect on the level of resistance. It seems that the team members who viewed their line manager as part of the team show milder resistance and scepticism towards the semi-digital tool compared to team members who view their line manager as part of the team. For example, one team member viewed the line manager as part of the team, as the following quote shows:

*"I have the feeling that even though we are not all equal in terms of hierarchy it most certainly feels that way" (SM3)* 

It seems that the resistance in this line manager's team is present but not dominant, as the following quote indicates:

"I can imagine that when there are competencies mentioned in your job description that do not come back in the skillmatrix that it can lead to resistance" (SM4)

In comparison, in a team in which the line manager is viewed as part of the organizational hierarchy the resistance in the line manager's team towards the semi-digital tool is harsh but also seems slightly personal, as the following quote indicates:

"I found the whole skillmatrix a bit scary back then. (Name line manager) talks a lot with (name of one of the directors). We never see (name of the director) and we also don't know what (name line manager) tells (name of director)" (SM1)

Consequently, it appears that not only group size but also group connectedness plays a role in the level of resistance towards the semi-digital HR tool. So, the smaller the team the more likely a close connectedness with the line manager and the less likeliness for resistance towards the semi-digital tool.

#### 5. Discussion

#### 5.1 Alignment of frames as a means to measure success of sense giving?

The findings indicate that if the line manager understands the organizational intention of the semi-digital HR tool as intended then this seems to positively influence his satisfaction with the introduction of the tool. The reason behind this could be that if the line manager understands the 'why' of the semi-digital HR tool as it was intended, then both the individual frame (Davidson & Pai, 2004) and the organizational frame (Klos & Spieht, 2020) are aligned. Combining the frame theory and the sensemaking and sensegiving theory adds value to both theories as it provides a more holistic view of the relationship between the frames and both sensemaking and sensegiving. The use of frames adds an extra layer to both the sensemaking and sensegiving better. Vice versa, the sensemaking and sensegiving theories help to understand the 'why' behind the use of frames more in depth.

Furthermore, from the perspective of Weick (1995) the line managers' trust in digitalization could impact the line managers' personal view on organizational change. During the process of sensemaking, individuals focus mainly on cues which they extract from a situation based upon their past experiences (Bondarouk et al., 2016; Mills, Thurlow & Mills, 2010; Weick, 1995). So if the line manager had negative experiences with organizational change in the past, then the line manager is likely to reflect that experience during the introduction of the semi-digital HR tool. This study found that the line manager could lose the skepticism towards the semi-digital HR tool when the line manager already used the tool after

it was introduced. Thus, one could argue that the line manager's personal experiences drive his sensegiving process.

Also, when the line manager's personal frame and the organizational frame are aligned then the sensegiving of the semi-digital HR tool has a higher success rate than in the case of a misalignment of frames (Davidson & Pai, 2004; Klos & Spieht, 2020). This could be due to the fact that in case of frame alignment the line manager fully identifies himself with the organization and thus is more likely to bring across the semi-digital HR tool more credible than in case of a misalignment of frames.

However, in case the line manager's personal- and the organizational frame are not aligned then the digitalization is not per se doomed to fail. This research simply suggests that in case the frames are aligned then the chances of success for the digitalization are higher. This does not mean that if the frames are not aligned the digitalization is automatically less successful.

Interestingly, this present study found that the line manager's personal technological frame seems to have an impact on whether or not the line manager categorizes the semidigital tool as actual digitalization or even digital transformation. The technological frame of the line manager seems somewhat influential to the technological frame with which the team members look at the semi-digital HR tool. It seems that the team members tend to adapt to the technological frame of the line manager and organization even more as it appears that the line manager has the power to influence the frame of the team members. Frame alignment thus could increase the success rate of the digital HR tool implementation.

#### 5.2 Positioning the line manager as paradox navigator

From the findings of this study it appears that line managers often struggle with whether or not they position themselves as part of the team. The dual role of line managers during digitalization also often is characterized as "recipients of change as much as implementers" (Balogun & Johnson, 2004, p. 523). From the results of this study it seems that managers seem more inclined to take the lead during the introduction of a semi-digital HR tool when they position themselves more in the organizational hierarchy rather than as a part of the team. This struggle of role identity is a phenomenon that both Townsend and Hutchinson (2017) and Sharma and Good (2013) also detected. It seems that the line manager has a rather limited choice of roles during organizational change: line manager or team member.

However, from the findings of this study it seems that the role of the line manager is far more complex than simply being either line manager or team member. Often the line manager is required to be both at the same time and thus it seems logical to add the role of paradox navigator to the more role repertoire of the line manager (Ulrich, Kryscynski, Ulrichand and Brockbank, 2017). Initially, Ulrich et al. (2017) intended the role of paradox navigator to be an HR role to "effectively manage the inherent tensions in the business" (p. 43). The role of paradox navigator is the number one HR role driving business results (Ulrich et al., 2017) and consequently also should be a role option for line managers during organizational change as due to their dual role nature line managers can have a strong indirect impact on the functioning of the business (Shipton et al., 2015). From this study, this can be seen by the observation that the attitude of the line manager towards the intention behind the semi-digital HR tool seems to have an effect on how the team members of the line manager view the tool. Consequently, line managers should be able to overtake a less subjective role during the introduction of the semi-digital HR tool as there always is a chance that a line manager does not like the organizational change and negatively influences his team through negative sensegiving. The more neutral role of paradox navigator would allow the line manager to overtake a helicopter view and objectively steer the introduction of the semi-digital tool, to "manage the tensions inherent to business" (Ulrich et al., 2017, p. 37). Interestingly, in this study one of the team members already recognized the need for objectivity in the line manager's role: "The skillgroup coordinator needs to have a helicopter view on what we can do as a skillgroup but also to see where we should head in the future" (SM3).

Yet, findings by Higgins and Kram (2001) on the relationship between mentors and their mentees indicate that strong relationships lead to more productive working relationships. In relation to this, the findings of this study indicate that the size of the line manager's team seems to have an impact on the acceptance of the semi-digital HR tool as well as the level of resistance. It seems that the smaller the team of the line manager the more likely a closer connection between the line manager and his team and the less likely it is that the team displays harsh resistance towards the semi-digital tool. In the case of line managers during the introduction of digitalization this could mean that especially by overtaking the more neutral role of paradox navigator the sensegiving of the digitalization could have a less productive effect.

On another note, a study by Nutt (1986) found that organizational change in which the person responsible for implementing the change exhibits personal power by trying to control all possible parts of the change only has a 43% success rate. This is in line with the findings of this study that it seems the line manager positions himself as being more part of the organizational hierarchy than being part of the team then he is more likely to take the lead in the introduction of the semi-digital HR tool. From the results of this study it is not clear whether or not the introduction of the semi-digital HR tool also is more successful when the line manager exhibits personal power, but it does indicate that a more neutral role could lead to a different rate of success of the introduction of the tool.

The role consistency of the line manager however seems to be of importance. The findings of this study indicate that line managers who actively anticipate opposition during the sensegiving process are more likely to effectively minimize resistance in their team compared to line managers that do not actively anticipate resistance during the sensegiving process. The more consistent these line managers chose their roles (for example active sensegiving and active anticipation of resistance) the smoother the reduction of resistance seemed to go.

Future research could further explore the role of line managers as paradox navigators during sensemaking and sensegiving. One aspect is whether the nature of the line manager's role during digitalization is not only dual (being part of the hierarchy and being part of the team) but trippel (being part of the hierarchy, being part of the team and being a paradox navigator). This could provide insight into how the line manager's personal sensemaking is affected by these role choices and how that again impacts his sensegiving process. Therefore, exploring the role of line manager's sensegiving is less affected by his personal sensemaking when he overtakes this more neutral role of paradox navigator.

#### 5.3 Personal preferences influence sensegiving

The findings of this study reveal that line managers seem more willing to accept the semidigital HR tool if they think that it directly adds value to their daily performance. This awakes the thought that line managers may be more open to digitalization if they see a personal gain in it. This is in line with the technology acceptance model (TAM) by Davis, Bagozzi and Warshaw (1989). The TAM model proposes that a person's behavioral intention to use a technology is a sum of the person's attitude towards using the technology plus how useful the person perceives the technology to be. Bondarouk and Ruël (2007) state that *"people tend to use (or not) an application to the extent that they believe it will help them perform their job better"* (p. 182).

Sonenshein and Dholakia (2012) also found that when the organization introduces the digitalization as more of an opportunity by using so-called 'opportunity frames', employees are more likely to show acceptance towards it. So, if the line manager perceives digitalization as an opportunity, he is more likely to be positive about it.

Also, it seems that the line managers are more likely to agree with the organizational intention of the semi-digital HR tool if they personally believe there is a necessity for the tool. This brings up the thought that the line manager's sensegiving could be influenced by his personal desires, for example, whether or not he believes the semi-digital tool adds value to his own position.

Sensegiving is of subjective nature and therefore always is influenced by cognitive frames (Bondarouk et al., 2016; Mills, Thurlow & Mills, 2010; Weick, 1995). Therefore, there

seems to be a certain truth in the thought that line managers may manipulate their sensegiving process depending on whether they believe the semi-digital HR tool adds value to their job. In this study, one line manager stated that the tool did not directly add value to his daily job and thus this line manager personally decided that it had little urgency: "It doesn't make my fingers itch and thus it's like the last item on my list of priorities" (LM3). This adds to the assumption that a line manager can personally steer the sensemaking of his team into a certain direction. It also affirms the need for a more neutral role option, like the one of paradox navigator, even more.

Another finding of this study is that it appears that the line manager's choice to either engage in active or passive sensegiving is related to the line manager's personal preference for being involved in the development of the semi-digital HR tool. Line managers who felt personally involved in the development of the semi-digital HR tool were more inclined to use active ascriptions to define the tool compared to line managers who were not involved in the development process. Again, this adds to the fact that sensegiving is a subjective practise that is difficult to control by the organization. Also, it brings up the thought that the cognitive frame of the line manager (Bondarouk et al., 2016) on personal preferences regarding involvement in organizational processes influences his sensegiving attitude.

#### 6. Implications and limitations

#### **6.1 Practical implications**

First, the results of this study suggest that the smaller the team of the line manager, the less resistance there is. A practical implication therefore could be to reduce the number of people the line manager has to give sense to in order to ensure the acceptance of the semi-digital HR tool.

Second, it is advisable for companies to let the line manager participate in the development of the tool. It seems that if the line manager feels part of the semi-digital HR tool he is more likely to convey the organizational message regarding the tool in a coherent way. It could be that the line managers develop psychological ownership for the tool. Psychological ownership is a phenomenon that describes the feeling of possession for an idea or concept (Ikävalko, Pihkala and Kraus, 2010). When the line managers fully support the digital HR tool then it could be that they also develop psychological ownership. Raising psychological ownership of the semi-digital HR tool amongst line managers seems desirable as this could increase the commitment of the line managers to the success of the implementation of the HR tool.

Third, companies should consider the fact that line managers are part of their team too and that their relationship with their team members may affect the sense jving process. If a company wants to ensure absolute consistency in the sensegiving process it should leave the task of giving sense to digitalization to a neutral (external) organ. Due to the dual nature of the line manager's role they may find themselves in an uncomfortable position in which they have to both fulfil their role as colleague but also as manager. This again refers to the theoretical implication that the line managers should be positioned in the neutral role of paradox navigator. If a neutral organ introduces the semi-digital HR tool the risk that personal relationships influence the sensegiving process are minimized. However, this choice depends on the organization's size and culture as the findings of this study indicate that especially close relationships between line managers and their small teams seem to have a positive impact on the acceptance of the semi-digital HR tool.

#### 6.3 Limitations

One limitation of this research is that the semi-digital HR tool is only for 50% digital and thus cannot necessarily be defined as a first order digital transformation even though it seems to fulfil most of the criterias for a first order digitalization (Bartunek & Moch, 1987). Future research thus could focus on the line manager's sensemaking process of an actual first order digital tool to find out whether the findings from this study are comparable with the findings of a study on fully digital HR tools. Also, second- or third order digitalizations could then be studied to gain more profound general insights into sensemaking and sensegiving. For example, participants in this study may not have even thought of the semi-digital HR tool as a digitalization. This could have the effect that during more severe changes that happen for example during a second or third order digital transformation their reaction may be different. In relation to frame theory, this could have the effect that employees may use different frames during the second or third digital transformation which may alter their reaction to it. Thus it cannot be guaranteed that this study's findings also apply to second and third order digital transformations.

Another limitation of this study could be the fact that some respondents already got introduced to the semi-digital HR tool two years prior to this study whereas other respondents just recently were introduced to the tool. This could have the effect that the memories of the respondents who were confronted with the semi-digital HR tool two years ago may not be as accurate as the memories of the respondents who just recently were confronted with the tool.

#### 7. Conclusion

This study aimed to answer the question 'how does a line manager's personal sensemaking process influence his/her sensegiving procedure in the implementation of a semi-digital HR tool?'.

From the findings of this study it can be concluded that the line manager's sense giving process during the introduction of a semi-digital HR tool is influenced by his personal sensemaking mainly regarding three topics: attributed status, feeling of involvement, and personal convictions. Regarding attributed status, this research concludes that when the line manager attributes himself the status of being more a part of the organizational hierarchy rather than being a part of the team he seems to be more likely to take the lead in the introduction of the semi-digital tool. Concerning the feeling of involvement, this study finds that the line manager's choice to either engage in active or passive sense jving is related to the line manager's personal preference for being involved in the development of the semi-digital HR tool. Also, when the line manager feels engaged in using the digitalization he seems more likely to lose the skepticism towards the semi-digital HR tool. Furthermore, when the line manager feels very involved with his team it seems to positively impact the team's acceptance of the semi-digital HR tool as well as the level of resistance. The smaller the team of the line manager the more likely a closer connection between the line manager and his team and the less likely is resistance. Regarding personal conviction, this study finds that line managers seem more likely to agree with the organizational intention of the semi-digital HR tool if they personally believe there is a necessity for the tool to exist. Also, the line manager's personal technological frame seems to have an impact on whether or not he categorizes the semidigital HR tool as actual digitalization. Next, the line manager seems more willing to accept the semi-digital tool if he thinks that it directly adds value to his daily performance on the job.

Overall, it can be concluded from this study that the personal sensemaking of line managers mainly influences the line manager's sensegiving process during the introduction of the semi-digital HR tool in terms of personal attribution, feeling of involvement and personal convictions.

#### <u>Appendix</u>

#### 1. Skillmatrix



	Vakvolwassenheid "volgens de norm"
Functie 1	
Functie 2	
Functie 3	
Functie 4	
Functie 5	
Functie 6	
Functie 7	

#### 2. Interview questionnaire (in Dutch)

#### Alleen vakgroepleden

Alleen vakgroepcoördinatoren

#### <u>Algemeen</u>

- Zou jij je even willen voorstellen?
  - Hoe heet je?
  - Wat is jouw functie binnen Construct?
  - Hoe lang werk je al bij Construct?
  - Tot welke vakgroep behoor je en wat is jouw rol in deze vakgroep?
- Hoe zou je de sfeer binnen jouw vakgroep omschrijven?
  - Hoe zou je de relatie met jouw vakgroepcoördinator omschrijven?
- Ben je weleens onderdeel geweest van technologische transformatie in jouw werk?
- Wat is jouw kijk of digitale transformatie bij Construct?

#### **Skillmatrix**

#### 'Sensemaking' – Zin maken van ...

- Wil je in jouw eigen woorden uitleggen wat de skillmatrix is?
- Wat is het eerste wat je dacht toen je voor het eerst van de introductie van de skillmatrix hoorde?
- Wat denk je is de bedoeling van de skillmatrix?
  - Waarom voert DV volgens jou de skillmatrix in?
- Hoe heb je van de skillmatrix gehoord?
  - Hoe heeft Construct je over de introductie van de skillmatrix geïnformeerd?
    Hoe is dat toen gelopen?
- Hoe denk je dat de skillmatrix bijdraagt aan Construct?
  - Wat is volgens jou de toegevoegde waarde van de skillmatrix voor Construct?
     Waarom denk je dat?
- Wat wordt er van jou vanuit jouw rol bij Construct verwacht omtrent de skillmatrix?
- Hoe heb je het hele skillmatrix proces beleefd?

#### 'Sensegiving' – Zin geven aan ...

- Wat is jouw rol in het introductieproces van de skillmatrix?
  - Wie heeft die rol bepaald?
  - Hoe geef je deze rol invulling?
- Hoe zou je de reactie van jouw collega's toen de skillmatrix geïntroduceerd werd omschrijven?
  - Waarom denk je reageerden ze op die manier?
- How denk je kijkt jouw vakgroepcoördinator tegen de skillmatrix aan?
- Hoe heeft jouw vakgroep coördinator de skillmatrix naar jouw vakgroep toe vertaald?
- Hoe heb je de skillmatrix naar jouw vakgroep toe vertaald?
- Hoe ga je met weerstand tegen de skillmatrix binnen jouw vakgroep om?

Wat zou je verbeteren als Construct de skillmatrix opnieuw voor de eerste keer zou introduceren?

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