

# Optimization of IT-based Interaction Processes for Leadership

Masterarbeit

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Name: Dubrovina



Vorname: Anastasiya



Prüfer: Prof. Dr. Michael H. Breitner

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## **Abstract**

*Recent attempts to improve performance management are directed towards the changes in leader-follower communication, a process which is increasingly based on information technology (IT). These changes require additional support from IT, if increased effectiveness is to be realized. The purpose of this study is to address this issue of effectiveness and investigate how IT-based interaction processes for leadership can be optimized. A research model is developed, including suggestions for the optimization of the leader-follower communication and interaction processes, within the process of performance management. Additionally, success factors for the IT-based realization of communication leading to effective interaction processes for leadership are formulated. On the basis of 19 expert interviews, the results indicate a clear positive impact of increasing feedback; in particular, informal feedback which facilitates the interaction processes for leadership. This, in turn, leads to an increasing effectiveness of performance management. As predicted, the increasing communication also leads to an increasing focus on development, while having a positive impact on interaction processes and goal achievement. Further, IT can help to realize this optimization whereas the idea of a tool extension is not clearly confirmed. These findings reveal that the prioritization and mechanism for a transfer from one channel to another, task-oriented communication and an increasing use of videoconferences, lead to effective IT-based interaction processes. However, the data analysis did not support a positive impact of chat and frequency of application. Drawing from this study, the findings, as well as implications for research and practice are discussed.*

**Key words:** *Effective performance management, leadership styles, followership styles, IT-based communication, interaction processes*

## **1. Introduction**

Studies and evidence from research, as well as from practice, are mounting that conventional approaches of performance management are broken. In particular, these approaches do not lead to desired results in terms of effectiveness and goal achievement (Rock, Davis and Jones, 2013, p. 1; Kulik, Morrison and Tinajero, 2015, p. 5). The challenges of rarely working well, irrespective of the time, effort and resources that are devoted to inherent in performance management are well known and have already been discussed for many years. Therefore, it has rightly earned its distinction as the “Achilles Heel” of human capital management. Some scholars have described a significant part of the problem that performance management has been reduced to prescribed, often discrete, steps within formal administrative systems, for which the results are highly reviewed. Although formal performance management systems are intended to drive and reinforce the day-to-day activities of communicating ongoing expectations and giving continual guidance, these behaviors seem to have become largely disconnected from the formal systems. Fundamental change is therefore needed for how performance management is implemented and viewed, from an administrative exercise to an integral tool that leaders have to help them accomplish work through others. The large number of unsuccessful attempts to improve performance management highlights its difficulties (Pulakos and O’Leary, 2011, pp. 147). Within the context of disruptive innovations and rapidly changing business environments, performance management has recently become one of the most debated topics within the HR arena. Some organisations have abolished their traditional performance management system and adopted a completely new approach. Other organisations are rethinking their current framework, considering one or more changes in the next 12 months (Wilkie, 2015, p. 3; Krullaars, 2015, p. 5). Suggestions for such improvements are supposed to be coupled with interventions that focus on improving leader-follower communication. This yields sustainable performance management improvements which are essential for effectiveness (Pulakos and O’Leary, 2011, p. 154).

Communication is not only important but also, when done poorly, it may have negative impact on the individuals and the organization as a whole (Mikkelsen, York and Arritola, 2015, pp. 337).

In light of the increasing decentralization and globalization of work processes, many organizations have responded to their dynamic environments by introducing virtual teams, in which members are geographically dispersed and coordinate their work predominantly with electronic information technologies (IT) (e.g. E-Mail, video-conferencing, etc.) (Hertel, Geister and Konradt, 2005, p. 82). Furthermore, rapid development of IT has led to a new paradigm of work, in the sense that it can now be conducted anytime, anywhere, in real space or through IT (Cascio and Shurygailo, 2003, p. 367). Regarding leader-follower communication, it is important to mention that the traditional relationship between leaders and followers continue to change. Hence, face-to-face (FTF) interaction between leaders and their followers decreases over time and most of the larger business organizations employ virtual teams to some degree (Mackenzie, 2010, p. 529; Orhan, 2014, p. 403). Furthermore, virtuality is a concept which is understood as a job characteristic that can be encountered in both virtual and non-virtual team settings. Whereas, task virtuality has existed at the individual level in every form of organizational structure since the penetration of the Internet to the workplace (Orhan, 2014, p. 403). The attribute “virtual” implies distributed work that is usually based on electronic information and communication tools (Hertel, Geister and Konradt, 2005, p. 70).

Leadership within this new context has been referred to as “e-leadership” or “virtual leadership” (Hambley, O’Neill and Kline, 2007, p. 1), defined as “a social influence process mediated by advanced information technologies to produce changes in attitudes, feelings, thinking, behaviour, and/or performance of individuals, groups, and/or organizations” (Avolio, Kahai and Dodge, 2001, p. 617). In this context researchers have postulated that in view of the rapid technology growth in organizations and their increasingly global reach, in the near future virtual leadership will be the routine rather than the exception in our thinking about what constitutes organizational leadership (DasGupta, 2011, p. 2).

As a result, the mentioned communication and interaction between leaders and followers, a process which must be improved in order to improve the effectiveness of performance management, is increasingly based on IT (Stone, et al., 2015, p. 217). Furthermore, several researchers have mentioned that the changes which are required in order to improve the communication are based on additional support of IT to be able to implement these changes within the organization (Krullaars, 2015, p. 11).

With regard to the mentioned problem and the described development in leader-follower communication, the aim of this master thesis is to investigate how the communication process of performance management can be optimized in order to ensure a higher effectivity in interaction processes for goal accomplishment. The second aim of this master thesis is to investigate how such an optimized communication process can be realized through the application of IT and what are necessary characteristics in order to ensure a high effectivity in communication and interaction processes. This, implies also the meaningfulness and usefulness with regard to a high effectivity of IT application for communication. Following from this, success factors for effective IT-based realization of communication leading to effective interaction processes are derived. Thus, the primary two research questions to be addressed in this study are:

**RQ 1:** How to optimize the cyclical communication process of performance management through feedback, resulting in effective interaction processes for leadership?

**RQ2:** What are success factors for effective IT-based realization of communication leading to effective IT-based interaction processes for leadership?

The remainder of this paper is structured as follows. After this introduction, the present state of research is presented in chapter 2. Furthermore, the leadership as a process of influence through communication (covering related steps in performance management process, leadership styles and followership styles) and interaction (covering the increasing shift towards IT-based communication and the importance of interaction within the leadership process) is explained. Chapter 3 describes the research design and methodology, including the qualitative data collection process and data analysis. Subsequently, chapter 4 entails the research model and hypothesis generation. In Chapter 5, the results of this research are presented. In the following stage, the results and the implications for research and practice are discussed. After a consideration of limitations, the paper finally ends with the conclusion and an outlook for further research.

## **2. Theoretical Background**

### **2.1 Literature Review and Status Quo Analysis**

Initially, existing literature was searched and reviewed in order to analyse the status quo in the field of IT-based interaction processes for leadership. The purpose of such a literature review is to disclose applied theories and methodologies used in a similar context by other scholars. In addition to that, it can help to discover further research questions or extensions of existing theories and thus close gaps in research.

In the past years, performance management strategies and approaches have run rampant and there always seem to be new ideas that promise improved results. Toppo and Prusty (2012, p. 2) noted that the topics of performance management improvement are almost as old as mankind and have undergone tremendous changes numerous times. In the 1970s' large organizations have adapted rating systems to define human performance. Followed by the approach of "rank and yank" in the 1980s' where a certain amount of people had to be ranked at the top and bottom ranges (Rock, Davis and Jones, 2013, p. 7). In the 20<sup>th</sup> century another big change, it has been realized that it is more important to focus on defining, planning and managing performance than merely appraising performance (Pareek, 2006, p. 102). Given that many changes to performance management over decades of practice have proven ineffective for addressing the problems that plague performance management (Pulakos and O'Leary, 2011, p. 154).

Recent approaches and ideas according to the improvement of modern performance management are directed towards leader-follower communication. In their study Pulakos and O'Leary (2011, p. 148) suggest a shift of performance management interventions that they believe holds promise for yielding sustainable performance management improvement. They propose to devote more attention to improving leader-follower communication and aspects of the leader-follower relationship that are foundational for effective performance management. Because, the dysfunctional behavior and attitudes that result from poor communication and lack of trust are so negative that performance management cannot be effective until action is taken to address these issues (Pulakos and O'Leary 2011, p. 156). Mikkelsen, York and Arritola (2015, p. 351) affirm in their study that communication and leadership behaviors are substantially related to employee outcomes. Hence, in order to improve individual outcomes and therefore organizational outcomes scholars suggest an increasing focus on and the improvement of leader-follower communication.

The topic of leader-follower communication is also recently gaining attention for a different reason. Since, organizations, jobs and teams are becoming more virtual as we increasingly communicate and perform tasks with non-FTF contacts (Orhan 2014, p. 401; Armutat, et al., 2015, p. 10). This is possible through the increasing use of IT. As a result, IT has not only become a core of professional

between the phase of transformation from performance to results and the transformation from results to potential a relationship can be ascertained. Since, the basis for the formulation of future development is the present performance. In case the present performance is not enough in order to achieve results, adaptations and measures for performance improvement need to be formulated. Though, without the evaluation of performance according to results a formulation or the intention of a transformation to future potentials is not possible or does not make sense.

Moreover, this thesis merely emphasized the impact of IT-based solutions on the effectiveness of the interaction processes for the transformation from performance to results. Hence, it is necessary to investigate the impact on the other two interaction processes.

Another point is, that besides the impact of leaders on followers and a general understanding of collaboration, in order to achieve effective communication and organizational goals, no back coupling effects of followers on leaders has been considered.

## **8. Conclusions and Outlook**

The starting point of this thesis is the challenge companies face according to the ineffectiveness of their performance management systems, which are not ensuring desired expectations and goal achievements. This leads to the necessity to overthink and change existing traditional performance management approaches and especially the related leader-follower communication and interaction processes. Thus, the first research question formulated in this context is: “How to optimize the cyclical communication process of performance management through feedback, resulting in effective interaction processes for leadership?”. The realization of such an optimization is assumed to be possible through an IT-based solution, in the form of an extension of existing performance related tools. Hence, the second research question arises: “What are success factors for effective IT-based realization of communication leading to effective IT-based interaction processes for leadership?”. Through a qualitative analysis of 19 semi-structured interviews, in three different companies, answers to these questions could be given.

With regard to the optimization of the communication process of performance management, it is shown that increasing feedback, while simultaneously increasing informal feedback have a positive impact on the interaction processes for leadership and therefore lead to an increasing effectiveness of performance management. This also applies for an increased focus on development, instead of the evaluation of performance. Hence, if leaders are giving more feedback on performance, this can lead to an increasing focus on development. Therefore, the optimization was mainly considered with regard to the growing demand for performance related communication. In particular, with regard to the interaction process from performance to results. This optimization is possible through the application of IT, since IT realizes quick and location independent communication. To be more specific, the extension of already existing performance related tools by a component of written communication, is a possible IT-based solution. The shift of communication or E-Mail based communication processes, into the tool, depends on the leader-follower communication situation. However, this text based communication can realize task- and relationship-oriented communication to achieve effective interaction processes. The bundle of communication and presentation of performance related data, creates the value of an enhanced overview, recognition of correlations and deviations in performance. This facilitates leaders in giving feedback on performance related activities according to their meaning for goal achievement. Therefore, it facilitates and improves interaction processes of transformation from performance to results. However, written communication is described as having some disadvantages, which need to be overcome, given that FTF communication is regarded as the most

favourable way to communicate. Concerning this, the overview and prioritization a tool is presenting for the recognition of followers' performance, can serve as a signal for negative performance and provide a mechanism for a transfer to FTF communication. The precondition for this, is the opportunity for FTF communication within the company. This is determined by the distance between leaders and followers, which also determines the general acceptance of a tool extension, as such it needs to be discussed for each company individually. In terms of a high distance, videoconference is one of the core success factors for effective interaction processes. With regard to the most effective tool application for communication, the simple and increasingly one-way communication is more effective via a tool than discussions and long explanations with a high amount of emotional and explosive content. Hence, task-oriented communication via a tool is more effective than relationship-oriented communication.

Based on the results and discussion, a variety of implications for research and practice are derived. With regard to the practice, it can be noted that companies need to emphasize the importance of regular and appropriate feedback conversations. If this is not given, companies are missing the chance to gain an additional advantage in terms of effectiveness of interaction processes and might fail to achieve their goals by the end of the year. This requires adoptions within the cyclical process of performance management, primarily in the form of more fixed and regular appointments for exchanging of performance related information. Such a decision, must be taken under the consideration of the diversity of individuals within the companies. Hence, companies need first to access and define communication processes within the existing structures. With these findings in mind and on the basis of the results of this study, companies can recognize how interaction processes, such as the transformation from performance to results, can be enabled through the application of an IT-based solution. Therefore, depending on the distance and the importance of IT-based communication, companies can overthink the existing application of IT or discuss new IT-based solutions. This means that even with a relatively low distance, adoptions in terms of the presentation of data can create more effective interaction processes for leadership. Consequently, this creates a great basis and hence support for communication. With increasing distance between leaders and followers the importance of IT-based communication will increase. Simple extensions by communication components in existing tools can create even greater support and in combination even greater opportunities for interaction processes. Whereas, the integration of video elements creates the highest value in order to compensate non-FTF communication.

Furthermore, it is not a matter of implementing IT-solutions or not, rather, it is about the general attitude of each individual and the organization as a whole, which is decisive. Therefore, organizations need to invest time and effort to make sure that leaders are willing to give feedback and communicate with their followers, otherwise they will not use any of the solutions provided. Moreover, organizations need to understand that a new tool will have to generate additional value for different types of people in their day-to-day work. Hence, it needs to be adaptable to different communication preferences and needs, as well as it needs to serve a value for the day-to-day work. For example, the tool allows simple and location independent communication, through a mobile application on the users' phone.

Future research could enlarge this study across different industries and cultural settings, allowing greater generalisability of results. Furthermore, more research is needed in companies with a higher distance between leaders and followers, in particular covering unconventional working conditions. Moreover, this study focused largely on the interaction process of transformation from performance to results. It would be interesting to analyse further success factor having positive impact, especially on the interaction processes as the transformation from potential to results, as well as the transformation from results to potential.

With regard to the development of advantages of location independent IT-based communication, this study has identified the need for the realization of IT-based solutions in form of mobile applications. In future studies, the topic of mobile applications should be discussed according to performance related communication and interaction processes for leadership. In line with this suggestion, the need for further research in terms of information security and necessary policies arises. This also needs to be analysed with regard to the employee motivation and application of IT-based solutions. Hence, future studies should investigate the impact of leadership styles on the acceptance of IT-based solutions and information security.