

## SELF-MANAGED TEAMS AS A KEY TO UNLOCKING DIGITAL TRANSFORMATION IN BUSINESS MANAGEMENT

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### ABSTRACT

*The research paper aims to contribute to the discussion on the impact of digital transformation on strategic business management. In this context, it introduces the use of self-managed teams as a potential solution for companies seeking to benefit from the market disruptions imposed by the digital era. In this light, the paper provides an overview of the existing literature on both digital transformation and people management approaches as well as an outline of the research conducted. In order to draw an inclusive picture as part of the conducted desk study, high-profile and current research from publishers, scholars as well as professional associations were considered. The first part of the paper focuses on the definition and scope of digital transformation followed by a detailed outline of the impact on business operations and strategic considerations of companies to effectively manage the latest wave of digitally infused changes. In light of those disruptive changes faced by firms worldwide, the issue of people management deviating from the outdated command and control model has gained momentum. The significant development and recent trends in people management therefore forms the second part of this paper, which will be complemented by a presentation of the main drivers shaping the renewed role of self-managed teams in times of digital transformation. The presented PhD research was conducted within the Doctoral School in Business Administration The Bucharest University of Economic Studies, Romania.*

### KEYWORDS

*Business management, Digital transformation, People Management, Self-managed teams*

### INTRODUCTION

The world seems to be spinning in an ever faster pace with uncertainty, technological and social disruption impacting on the overall perception of external change. At the same time, internal systems and organizational structures come under pressure given that the velocity of internal change is consequently outpaced by those external drivers. Against this background, the main factors of influence of digital transformation shape the business environment with new competition, tighter margins, better informed customers, constant innovation pressures on the product, service and business model side and undefined relations between humans and robots. Companies therefore need to address these topics through resilient, adaptive and dynamic organizational structures which deviate from the traditional command and control management style. Hence, flexible and customer-centric structures adopting a more decentralized approach towards decision-making are gaining momentum. In this context, the role and value of self-managed teams deserves particular attention. (Rosseel & Akhtar, 2016)

### 1. RESEARCH METHODOLOGY

The paper is the result of PhD research on business management and digital transformation, which is conducted *within the Doctoral School in Business Administration, The Bucharest University of Economic Studies, Romania*. In light of the early stage of research conducted, this research paper is based on a thorough and inclusive literature review with a particular focus on scholars, reputable publishers as well as professional associations. Against this background, the data set and publications taken into account totaled 40 sources with the aim of combining the driving forces of the latest wave of digital transformation with the development of people management approaches leading to the introduction of self-managed teams. In essence, the presented research paper centers on the question to what extent the influence factors of the digital era reinforce and positively impact on the set-up of such team structures. The later will be conducted through utilizing a meta-framework of self-managed team effectiveness introduced by ten Vregelaar (2017), which combines the most relevant elements from 50 different models and frameworks. Thus, the paper creates a link between the different root causes and provides conclusions for further research in the field.

### 2. IMPACT OF DIGITAL TRANSFORMATION

#### 2.1. Definition and scope of digital development

The subject of digitization is generally linked to the question of improving business operations through creating leaner and more effective processes and procedures. In order to reach such a degree of optimization, utilizing standardization as well as automation often are at the core of such efforts. Ultimately, it comes down to controlling costs while not compromising on quality. Firms always strive for improvements as not loose out to competition in the market. At the same time, market participants with a lack of innovation efforts might not be able to keep their competitive position with minor chances to stay on top of things. Reasons for firms not to push for digitization are evident given the challenging nature of the exercise since standardizing internal processes can be both time and resource-intensive. However, deepening digitization does come with a number of rewards for companies. This includes a better and sharper customer focus through improved client data as well as optimized scalability of business operations. On a strategic level, access to a wide range of quality data facilitates decision making processes and allows for more accurate planning. In times where firms struggle to navigate through the VUCA world, implementing professional, data driven management information systems can become a competitive advantage. Hence, acquiring holistic and integrated software solutions are one of the stepping stones considered by companies seeking to profit from digitization. Despite the fact that the challenge of digitization has been present for more than two decades, most market participants are still struggling with

designing and implementing a winning digitization strategy. This becomes evident with a look at research conducted by MIT, which highlights that only approximately 25% of established firms have fully digitized their entire business operations through adequate internal processes. Given that standardizing and automating is considered to be a vital first stop along the road towards mastering digital transformation, the low number of successful firms is fairly surprising. (Markovitch & Willmott, 2014; Nandram & Bindlish, 2017; Ross, 2017)

Digital transformation consists of a wide-range of different components across such diverse disciplines like computer science, social science, energy management and many more. At this point, firms around the globe predominantly center on dealing with the latest technological advancements. Those include the use of artificial intelligence, internet of things, cloud computing or social media. The multitude and complexity of different topics under the umbrella of digital transformation poses a particular challenge for firms seeking to piggy-back on the latest trends. On the one hand, firms aim to profit from a changing market environment influenced by such mega trends, on the other hand digital transformation has the power to fundamentally change entire industries and organisations. Traditional forms of doing business come under pressure with the equilibrium of supply and demand being affected significantly. Customers benefit from greater variety, an increase in transparency and better prices, while firms are forced to reinvent their business models to cope with tighter margins, fierce competition and higher customer expectations. In order to provide a new value proposition and to stay relevant, firms are required to create a customer-centric and dynamic environment with the aim of attracting digital talent. In order to achieve that, implementing a cooperative and innovation-driven business culture is equally important to translating such an approach into corresponding organizational structures. Considering these diverse aspects, digital transformation is far more disruptive than just launching a new website or online store, but it rather shakes the very foundations of business operations. (Hamel, 2012; Schallmo et al., 2016; Ross, 2017; Newman, 2018; Richards, 2018)

## 2.2. Impact of digital transformation on business operations

In light of the different factors of influence associated with digital transformation, business operations around the globe come under significant pressure. While the depth and scope of disruption differs based on the degree of digital sophistication around globe, Hirt and Willmott (2014) outlined a set of drivers imminent to digital transformation. Essentially, the different factors showcased below universally weigh on the strategic considerations of companies in the digital era:

### a) *Competition is getting tougher:*

The advent of digital services created by mushrooming internet companies has substantially impacted on the balance of power between established firms and digital newcomers. In essence, those contestants managed to breakdown industry market barriers fostering rent-seeking business models in the past. In contrast to these traditional ways of doing business, new challengers promote innovative management approaches, digital expertise and talented staff. This combination allows market newcomers to gain traction to steal market share from established competitors. Against this background, new business models turned conventional approaches upside down with Uber making headlines without owning a single car, AirBnb establishing itself in the hospitality industry owning a single accommodation and direct bank ING reaching 8 million clients without a branch network across Germany. However, this can be seen as the first step of the digital trends, given that technology heavyweights such as Apple or Google use their brand reputation to venture into completely new fields of business, for example finance and payment solutions. (Handelsblatt, 2018)

### b) *Profits come under pressure:*

The balance of power is not only shifting between established firms and digital contestants. In addition to that, customers benefit from a notion towards greater transparency through web-based product and service sites. Furthermore, the sheer number of internet options increases the range of available products, while crowdtesting sites enable buyers to make more educated decisions beyond falsy and often misleading market efforts conducted by firms. This emancipation of customers has a significant impact on prices with the pressure on margins felt by companies. Depending on the scope and depth of digital sophistication, there are however significant regional disparities. (Grab et al., 2018a)

### c) *Customers pick their go to places:*

The current trends in digital transformation lead to customers choosing their digital champions which reinforces a virtuous cycle for those selected companies. At the basis of good and seamless experiences in previous transactions, customers revisit those customer-centric providers which benefit from dynamic organizational set-ups and motivated staff. The success makes them more attractable to talents in the market. This desirable aura translates them into go-to places for customers and employees. (Grab et al., 2018b)

### d) *Advent of integrated business models:*

In light of the development towards individual firms benefiting from a virtuous cycle securing a winner taking all market position, the question is evident to what extend other market participants are able to secure a share of the profits. Given the platform interface used by various multi-purpose websites like Amazon or TripAdvisor, smaller competitors can use these structures to plug-in their own businesses to create a mutually beneficial relationship. On the one hand, smaller players benefit from the existing and safe platform frequented by many customers, while the platform provided can offer a wider range of products and services. (Schallmo et al., 2016)

### e) *Ever-changing business models:*

The road towards digital transformation is long and winding. In addition to that, there is no fixed end which allows companies to pause and enjoy their successful present in a secure setting. On the contrary, it's an eduring process which forces companies to develop, change and adapt to the different stages of digital evolution. In this context, companies aiming to stay ahead of competition need to build resilient and adaptable organizations which are positioned to change in accordance with volatile market requirements. Hence, business models are not fixed, but are constantly under observation to defend market share against new

competitors. The constant change of business models can be seen with digital players such as booking.com which intends to widen its product and service range to broaden their customer and revenue base. (Clinton & Whisnant, 2019)

f) *Robotic vs. human talent* :

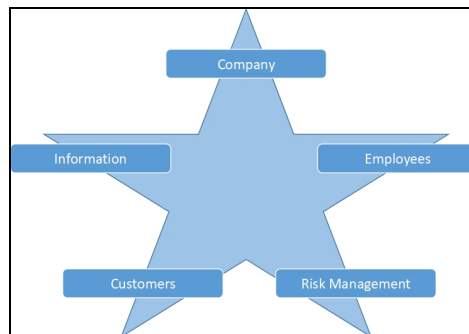
The rise of robotics and the development of artificial intelligence are expected to have drastic effects on the composition and requirements of the future labour markets. While individual jobs across all disciplines may fall victim to the latest technological advancements - Frey & Osborne (2013) project that every second profession could be compensated for by robotics or artificial intelligence – the demand for solution-driven and highly specialized professions could rise significantly going forward. This fierce war for talent will have an impact on recruiting and staffing efforts by companies. (Manyika et al., 2017; Nedelkosa & Quintini, 2018)

g) *Convergence of global business activities*:

While the prevalence of e-commerce is not yet evenly distributed across the globe, its overall growth rate is gaining momentum. In the light of the trend toward an increase in online retail activities, client expect to receive a comparable service and product standard across borders. This includes the entire value chain of the transaction, starting from the initial selection process followed by product delivery and payment options to potential use of after sales customer service. (Yu, 2019)

### 2.3. Strategic considerations on digital transformation

With reference to the factors of influence highlighted above, it becomes evident that the digital evolution is more like a long-distance exercise than a sprint. Therefore companies need to prepare for setting up structures and systems that are resilient, adaptable and flexible. This however puts substantial pressure on organizations. In this context, an integrated framework can support firms in structuring their strategy formulation for the digital era. Hence the digital transformation star centers on the key elements for driving the strategic discourse on the matter as shown in Figure 1:



(Source: Grab, B., Oлару, M., Gavril, R. 2019, The Impact of Digital Transformation on Strategic Business Management, Ecoforum Journal, Volume 8, No 1 (2019)

Figure 1 - Digital transformation strategy star

a) *Company*:

Firms are forced to create an open and collaborative working environment to internally spur innovation and creativity to stay ahead of competition in a volatile and fast-paced business environment. This is only possible, when old forms of hierarchical leadership and command leadership are traded for more agile ways of work with a ball of ideas, instead of a fight for status. Fostering entrepreneurial thinking and bold decision making is at the heart of the next leadership generation, therefore new organization structures will play a substantial role going forward. (Hamel & Breen, 2007; Hamel, 2012; Weill & Woerner, 2015)

b) *Employees*:

The ongoing digital evolution creates a complex change atmosphere for many employees with organizational structures being adapted and job profiles getting amended. At the same time, new styles of leadership require a more active workforce, problem solving skills and a drive for constant learning. This burden of adaptability and creating value is further intensified by an ambivalent and yet undefined relationship between human and artificial intelligence. (Hamel, 2012; Ford, 2015; Weill & Woerner, 2015; Nedelkosa & Quintini, 2018)

c) *Customers*:

The needs and requirements of customers around the globe have been largely impacted by the recent wave of digital transformation. With the advent of internet services, the degree of transparency has increased in line with sheer range of products and services on offer. In addition to that, the seamless customer value chain offered by digital solutions has a substantial impact on the overall service expectations regarding speed, constituency and quality both on and offline. (Hamel, 2012; Hirt & Willmott, 2014)

d) *Information*:

Information is often considered to be the most precious commodity of the digital era. Therefore, companies may improve their competitive position through improvements in sourcing, processing, analyzing and translating both customer and market data. With the help of data analytics, ever larger data packages can be translated into business value, if clients receive products and services which are tailored to their very individual needs. In order to enrich the internal process of strategic formulation and implementation, data from various sources can be streamlined for a leaner and more effective planning business, while companies can further benefit from an open information policy allowing ideas to travel freely within an organization. (Hamel, 2012; Bennett & Lemoine, 2014)

e) Risk management:

Risk management in a traditional fashion is no longer capable of fully assessing and processing the significant changes of the digital era. The adaptation of new technologies in combination with experts taking a more inclusive stand could support companies in detecting the essential business drivers for the future. This could be an incremental next step towards adding value to the business operations while moving away from static and often cumbersome processes. (Hamel, 2012; Tupa et al., 2017)

### 3. PEOPLE MANAGEMENT APPROACHES

People management theories and models have come a long way from the early days of classical organizational theories which were developed under the influence of the industrial revolution. Those scholars primarily focused on work procedures and technical tools, which led to the emergence of industrial engineering combined with a bureaucracy based on a centralized command and control model. At the heart of these theories were the productive efficiency of companies. In this context, employees were treated as an interchangeable resource with very little need for training or participation in decision-making (Taylor, 1911; Scott & Mitchell, 1976; Hackman & Oldham, 1980; Weber & Andreski, 1983). Only with the advent of human relations theorists starting in the 1930s, scholars such as Roethlisberger and Dickson (1939) or later Maslow (1954) adopted the issue of employee involvement in combination with autonomy, self-realization and satisfying individual needs. As part of later forms of human relations theorists, the participative management scholars emphasized on the importance of trust in the employee-employer relationship which leads to greater organizational effectiveness by allowing employees to be involved in decision-making processes. This can be considered the first step towards participation in decision-making and therefore paves the way for self-management. (Anthony, 1978; Hackman, 1978; Lawler, 1986). Scholars of systems theory later underscored the necessity of self-management as a vital cornerstone for bridging the gap between technical and social structures, which form the two major components of the work environment. (Trist & Bamforth, 1951; Pasmore et al., 1982; Holt, 1990). In a final step, scholars and followers of the contingency perspective focused on the preconditions and requirements of high performance organizations which are influenced by human, technological and environmental factors in their decision-making process. In this context, it is assumed that employees being closely and directly affected by these factors of influence have the best capacity to manage them successfully, which forms the basis for the introduction of self-managed teams (Cummings, 1978).

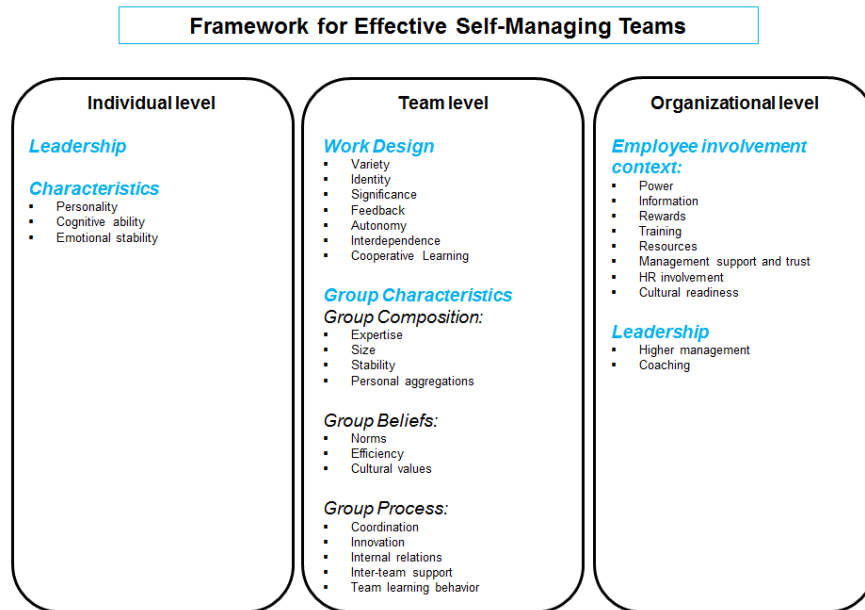
#### Definition of Self-Managed Teams (SMTs)

According to Tjepkema (2003), self-managed teams differ considerably from standard work teams with reference to the following characteristics:

- It involves a group of coworkers who jointly and permanently work based on shared responsibility for the expected outcome. In this context, all required steps towards finalizing the product for the final customer are defined independently;
- The group of coworkers utilizes a joint and mutually agreed purpose and approach to both manage itself as well as to conduct the necessary activities;
- One of the preconditions for a successful and effective product delivery is embedded in the availability of data and information. At the same time, the provision of resources, competencies and decision-making power are essential elements.

Hackman (1978) further emphasizes on the importance of a balanced compensation and feedback system as part of the holistic work design, in order to effectively reward the achievements made by the team. In contrast to the composition and the elements of successfully implementing self-managed teams in a work design, scholars did not focus on the actual necessity of or the requirement for a dedicated supervisory role.

With respect to the structure of self-managed teams, there are numerous possible ways to organize networks of employees to independently work towards a common target. In most incidences, organizations turn towards such an organizational set-up with the aim of fostering exchange and collaboration. The expectation concerning higher productivity, improved performance and employee satisfaction is further enriched by cross-functional cooperation and practical learning. In order to achieve such high targets, ten Vregelaar (2017) combined the results of 60 studies on self-managed teams to introduce a joint framework for effective utilization of such teams. The framework is broken down into three dimensions to be considered: individual, team and organizational level. This enables scholars and practitioners to see the big picture while being able to identify points of consideration for additional analysis and research. In this context, the role of self-managed teams in the context of digital transformation can be further assessed.



(Source: ten Vregelaar, R., 2017. Identifying factors for successful self-managing teams: an evidence-based literature review, Enschede: University of Twente, Retrieved 3 January 2019 from: [https://essay.utwente.nl/72758/1/Vregelaar\\_ten\\_BA\\_BMS.pdf](https://essay.utwente.nl/72758/1/Vregelaar_ten_BA_BMS.pdf))  
 Figure 2: Framework for Effective Self-Managing Teams

#### 4. ROLE OF SELF-MANAGED TEAMS IN TIMES OF DIGITAL TRANSFORMATION

In order to define the role of self-managed teams in in the digital era, it is important to identify and analyse the current change drivers on a company level. In a subsequent step, these elements allow for a more balanced assessment concerning the viability and relevance of self-managed teams. As part of its annual digital transformation assessment, Futurum Research (2018) conducts research on the main elements assisting companies worldwide in staying on top of the digital evolution. The results are summarized in a yearly index to rank the primary factors in accordance with their value for organizations. Figure 3 highlights the key factors to be considered as a basis for creating robust, dynamic and digital companies.



(Source: Newman, D., 2018. 2018 Digital Transformation Trends: Where Are We Now?, Forbes: 20 August 2018, Retrieved 3 January 2019 from: <https://www.forbes.com/sites/danielnewman/2018/08/20/2018-digital-transformation-trends-where-are-we-now/#5ce36efbc647>)

Figure 3: Internal factors of Digital Transformation

Of the six factors portrayed in the index, the topic of establishing relationships with technology partners rank the highest, which is understandable given the pressure for technological advancement in the digital era. With reference to the three factors with a comparable rating, it is noteworthy to highlight that company culture, support from managers as well as the issue of knowledgeable employees are all soft factors which are integral components of successful self-managed teams as highlighted above.

Based on the meta-level framework on self-managed teams, there are particular elements which are impacted by the latest wave of digital transformation. In the following, the degree and scope of impact will be outlined, in order to determine to what extent utilizing self-managed teams could receive a positive stimulation through the ongoing changes in the working environment. In

essence, three main are affected which cover all levels introduced in the framework: individual, team as well as the organization level:

a) Individual level:

Personality – The next generations entering the workforce are both brought up in times where internet services and the use of social media have been part of the daily business. In this context, they are used to collaborating and sharing information and consider a battle of ideas as more valuable as a battle for status. This has a significant impact on the way of working and the expectations of this generation on their working environment. Purely hierarchical organizations with status-driven decision making processes will have a tough time recruiting such young talents given their focus on a positive working environment in the selection process. The use of company review sights allows for a greater degree of transparency on the employees' side, hence companies providing a more collaborative environment will likely play a better role in attracting member of those generations. (Hamel, 2012; Stahl, 2018)

b) Team level:

Work design – In light of the recent advancements in artificial intelligence, computing and robotics, a fair share of repetitive tasks is likely to fall victim going forward. Based on a recent analysis conducted by McKinsey, featuring approximately 2000 work activities across 800 occupations, it was highlighted that in a mid-term horizon roughly half of the work activities could be fully automated. However, at this point only the most repetitive tasks and occupations can be fully made redundant by artificial intelligence, which translates into 5% of all occupations. Fewer repetitive tasks frees up time for employees to focus on more complex and challenging work with potentially positive impact on the overall work design. A fact that fosters utilizing multi-disciplinary work teams with greater autonomy and decision-making power, in addition to catering to demand of new generations towards purpose and a sense of belonging. All these elements enrich the work design to effectively implement self-managed teams. (Hamel, 2012; Landrum, 2017, Manyika & Sneider, 2018)

c) Organizational level:

Employee involvement/leadership – The pressure on organizations to transform becomes evident from two different angles: innovation pressure and talent pressure. With reference to innovation pressure, firms are forced to reinvent their business models to cope with tighter margins, fierce competition and higher customer expectations. In order to provide a new value proposition and to stay relevant, firms are required to create a customer-centric and dynamic environment with the aim of attracting digital talents. In order to achieve that, implementing a cooperative and innovation-driven business culture is equally important to translating such an approach into corresponding organizational structures. The latter will also address the talent pressure concerning employee involvement and leadership, in the sense that an open sharing culture, in combination with lean decision making processes will require a more collaborative leadership as requested by the next generation of employees. All elements introduced on the organization positively impact on the effectiveness of self-managed teams in a company context. (Hamel, 2012; Schallmo et al., 2016; Ross, 2017; Newman, 2018)

## CONCLUSION

Self-managed teams combine a number of elements which are considered to be essential for implementing customer-centric, cross-functional and entrepreneurial-minded, high performance work structures. In the context of digital transformation, current changes across three levels (individual, team and organizational) positively influence on the utilization of self-managed teams and its overall effectiveness. While the desk study of theoretical concepts and current research supports the reinforcement of more dynamic, agile and employee-driven decision-making processes through the key drivers of the digital era, further practical research will be required to assess the actual value for organizations. In this context, case studies on company-level as well as expert opinions of practitioners may enrich the overall discourse on the benefit, performance and effectiveness of decentralized team structures both in a project as well as a full company context.

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