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Management 3.0: A Systematic Literature Review and Research Agenda

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ABSTRACT

Management 3.0 is a new concept that intends to revolutionize the way managers and leaders act within companies to offer a more happy, collaborative, and productive work environment. This paper aims to analyze the management 3.0 phenomenon and establish a research agenda in the field. A systematic review was conducted considering 215 published studies in the field between 2010 and 2019. The findings reveal that management 3.0 is an emerging area and one that has grown in 2019 and involves multidisciplinary research teams from management, leadership, information technology, and psychology.

Keywords: Management 3.0; Self-managed Teams; Leadership; Organizational Agility; Empowerment.

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INTRODUCTION

Organizations are experiencing a phase of digital transformation. However, as Schwertner (2017) notes, this transformation is not exclusively digital and includes a change of culture and a new way of working and interacting. In this context, the role of leadership is essential for success. Management 3.0 appears as a movement proposed by Appelo (2014) that seeks to inspire leaders to rethink the work system making it more productive and happier. The objective of this management approach is not to select the best proposals, but to create a system and working environment that encourages the emergence of the best ideas.

Management 3.0 is an evolution of the previous management models. Management 1.0 is based on a top-down work orientation, with low freedom in decisions and creations. The second evolution (i.e. Management 2.0) sought essentially to develop new, more effective management techniques (e.g. Total Quality Management, six sigma). However, the decision structure is still very vertical. Finally, management 3.0 aims to provide an environment where all employees are responsible for management success. Appelo (2011) considers this model enhances people and teams.

Management 3.0 is an innovative leadership movement that advocates the management processes are too important to be exclusively thought out and defined by top managers. Appelo (2014) argues that management should be participative and the responsibility of a group of people, in which the happiness of people is a priority of this management model. This model also defends that organizations should not focus on hierarchies and burdens. Its priority should be the way people behave and relate. Organizations should be considered as large systems of high complexity in which large networks of relationships between people are established (Bond-Barnard et al., 2018). Diaconu (2019) states there are many similarities between Management 3.0 and agile methods. The principles are identical when we look at the concepts of experimentation, autonomy, self-organization, and continuous improvement. However, the objectives are different. Agile methodologies are focused on product delivery, while Management 3.0 is focused on the growth of organizations and people.

Management 3.0 is a concept and not a framework or methodology that has a set of rigid steps to be adopted by organizations (Appelo, 2014). Management 3.0 was initially applied to companies in the information and communication technology sector. However, other business segments are progressively adopting the concept as a new approach to leading teams to promote more agile organizations and more productive employees. There are many references in the literature about agile methods and their application in project development and management (Almeida et al., 2019; Azanha et al., 2017; Hidalgo, 2019). The application of agile principles to the leadership of organizations is an emerging theme and it becomes important to explore and synthesize, particularly in the context of the principles advocated by the management 3.0 paradigm. Management 3.0 has stood out essentially in the entrepreneurial component and has enabled the sustainable growth of organizations in highly turbulent environments, where it is necessary to anticipate market needs. However, the scientific study of the subject is very residual and there are no studies that synthesize the various dimensions of management 3.0 and explore its scientific relevance. This study addresses this research gap by carrying out a systematic review on Management 3.0 in the last 10 years (2010-2019) to understand the relevance of this theme for the scientific community, identify the main issues that have been addressed, and characterize the countries and institutions that have led this research. Furthermore, it is also intended to provide a roadmap to serve as a conceptual reference on several promising research streams.

LITERATURE REVIEW

Management 3.0 was proposed by Jurgen Appelo in 2010 and associated with the concept of leadership in agile environments. Appelo (2014) considers there are six visions to achieve success with Management 3.0, respectively: (i) to energize and motivate people by valuing human capital; (ii) to empower teams by encouraging self-management in which team members can participate and make important decisions for the company; (iii) to align restrictions to ensure that the freedom given to teams is compatible with the goals of the organization; (iv) competence development in which the development of individual skills is essential to help strengthen the team; (v) growing the structure in which organizational growth should be focused on the quality of the collaborative environment; and (vi) continuous improvement through the improvement of processes, teams and people, in which the aim is to reduce failures and turn processes more efficient.

The principles of Management 3.0 have become a reference in many organizations that adopt agile methodologies as their work methodology. However, the scientific component has not felt the same evolution. In this sense, it becomes relevant to look at the studies that have emerged and that support Jurgen Appelo's initial vision. The following research question has been established:

RQ1. What studies have been published on Management 3.0?

Management 3.0 views management as part of a system, in which people and relationships influence the environment and its boundaries. As Groeger et al. (2019) argue, systems are complex in that their multiple relationships, regardless of whether they are known or not, contribute to creating an unpredictable system. Therefore, complexity is related to unpredictability, and there is no complexity that is not already related to the difficulty of understanding.

People are the most important part of a system (Daryani & Amini, 2016; Zurub et al., 2015). In this sense, management must do everything possible to keep them active, creative, and motivated. Through this it also seeks to encourage innovation through a bottom-up approach in which all employees are motivated to participate in this process through a crowdsourcing model (Almeida et al., 2019). Studies exploring various approaches to extrinsic motivation based on bonuses and rewards have emerged (Darmaki et al., 2019). However, management 3.0 views these practices as harmful and toxic to an organization. On the contrary, management 3.0 understands that the best way to have motivated professionals is to align the organization's goals with people's intrinsic values and vice-versa.

Team empowerment is a core value that can be found in Management 3.0. As Hanaysha (2016) acknowledges, empowerment of a team can be accomplished through delegation of authority namely by delegation. The process of delegating does not make management weaker and corresponds to a loss of power of the leader. In Management 3.0 it is argued that more powerful teams also make their leaders more powerful.

The implementation of Management 3.0 in an organization is associated with employee engagement. Its implementation cannot be viewed only in the short term since Management 3.0 is not a ready-to-adopt framework, but a set of principles and values that should guide the functioning of organizations (Appelo, 2014). It is up to the leaders of organizations to cultivate the values of Management 3.0 in their organizations. Therefore, one of the main steps to adopt it in an organization is to create a setting where everyone feels comfortable to think, decide, and innovate. Management 3.0 is supported by several visions that it is relevant to summarize. Therefore, the following research question was defined:

RQ2. What research topics do they explore?

In a systematic review it is important to follow a set of procedural formalisms. The systematic literature review is a secondary study that aims to gather similar published studies analyzing it critically. By synthesizing similar primary studies of good quality, it is considered the best level of evidence for knowledge and decision making in a scientific area (Gough et al., 2017). To avoid the analysis bias in the systematic review, the proposal of Tranfield et al. (2003) was adopted, which advocates a set of sequential phases in the process of collection, analysis, and evaluation of studies to be included in a systematic review of the management literature.

Three more research questions were also defined that are relevant in the context of conducting a systematic review, respectively:

RQ3. What is the adopted methodology?

RQ4. Which are the main publishers in this field?

RQ5. Who is leading this research?

These research questions are aligned with other systematic review studies conducted in adjacent areas to management 3.0 such as lean management, corporate social responsibility, and industry 4.0 (Lubis et al., 2019; Piccarozzi et al., 2018; Sinha & Matharu, 2019). RQ1 is relevant to understand the importance given to this phenomenon by the scientific community. For this purpose, a period of analysis of 10 years was considered. RQ2 is important to understand the research topics that have raised more interest in the scientific community. Moreover, it is also relevant to explore the areas of the greatest conceptual and practical impact of Management 3.0. RQ3 is pertinent in allowing the focus on the scientific component of Management 3.0 by scientific publishers. Finally, RQ4 allows us to briefly understand which countries have been leading this line of research worldwide.

METHODOLOGY

This study adopts a protocol for conducting the activities related to the systematic review. The adopted protocol proposal follows the model presented by Tranfield et al. (2003) that was adapted from the Cochrane Handbook for Systematic Reviews of Intervention guideline. A set of four sequential phases were followed: (i) identification of the studies considering multiple databases; (ii) screening that implies the removal of duplicates and publications with no relevance to the subject looking at the abstract of each study; (iii) eligibility in which the eligibility of each study is evaluated considering the full-text articles; and (iv) studies included in the qualitative and quantitative synthesis. Figure 1 presents the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) of this process.

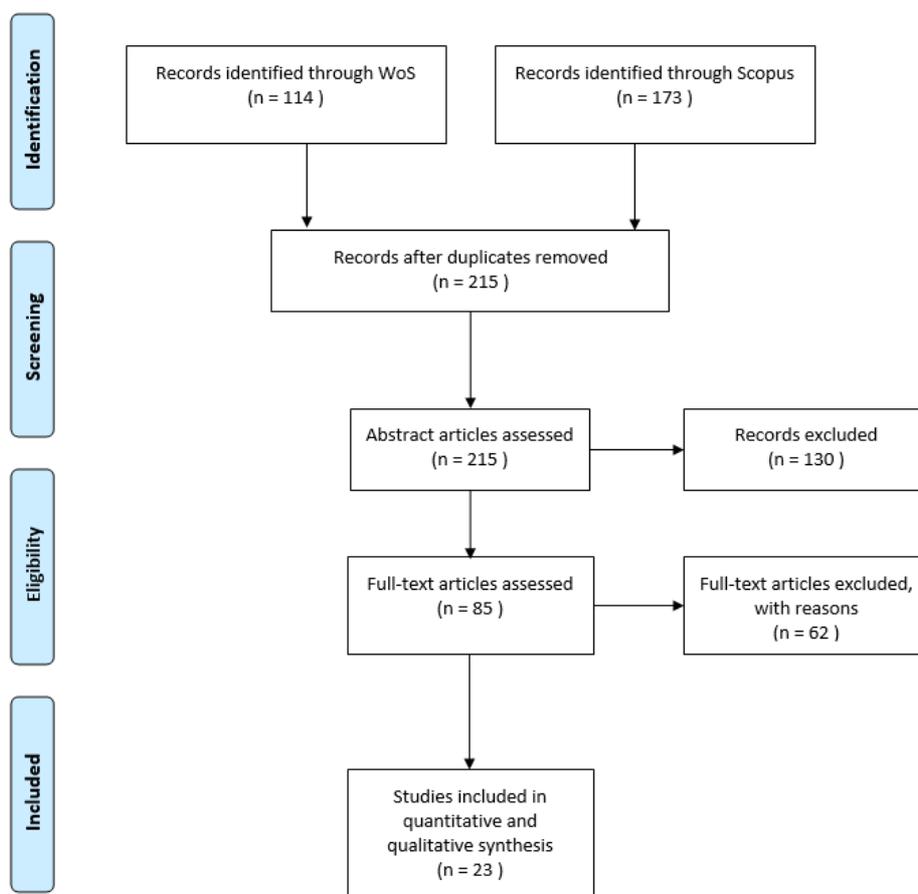


Figure 1. PRISMA diagram

A total of 215 publications in the last 10 years (2010-2019) were considered after the removal of duplicate records in WoS and Scopus databases. The abstract of these publications was analyzed and 130 studies were excluded as they did not fit into the scope of management 3.0. After that, the full-text of 85 articles was accessed, and 62 studies were eliminated because they did not obtain the minimum value in quality assessment due essentially to three reasons: (i) focus on the development of agile methodologies for the IT sector; (ii) focus on the challenges related to knowledge management and on the technologies that allow promoting its development; and (iii) applicability in local contexts to specific activity sectors and that do not allow generalizing the conclusions of these studies. In the end, 23 studies were considered for quantitative and qualitative analysis, respectively: Benders et al. (2014), Carvalho et al. (2019), Gerpott et al. (2019), Gong & Janssen (2012), Grand & Bartl (2019), Gutierrez et al. (2019), Johnson & Kruse (2019), Korge (2017), Kotter & Von Ameln (2019), Lederer et al. (2019), Magpili & Pazos (2018), Markova & Perry (2014), Millikin et al. (2010), Obydenov (2019), Parker et al. (2015), Paunova & Lee (2016), Perry et al. (2013), Przybilla et al. (2019), Strelnikova et al. (2018), Van der Vegt et al. (2010), Walker (2012), Weerheim et al. (2019), and Yazid et al. (2018).

3.1 Inclusion and exclusion criteria

Articles with peer review published between January 1, 2010 and December 31, 2019 were included. Only articles written in English, with full text available online, were also considered. All studies in the area were considered regardless of the methodology adopted (for example, literature reviews, qualitative, quantitative, or mixed methods). Articles published in journals, conferences, and book chapters were also considered. Exclusion criteria were considered duplicate reports from the same study, published before 2010, dissertations and theses, and gray literature (not published in peer-reviewed indexed journals).

3.2 Databases and search terms

The Web of Science (WoS) and Scopus were used as databases of scientific publications. Four WoS collections were considered: (i) Science Citation Index Expanded; (ii) Social Sciences Citation Index; (iii) Emerging Sources Citation Index; and (iv) Conference Proceedings Citation Index. Other databases such as IEEEExplore, Emerald, Taylor&Francis, Springer, and Wiley were not included because after an initial exploratory study it was verified that most of their scientific journals are already included in WoS and Scopus. Google Scholar was not considered due to the high heterogeneity of the quality of the publications since some of them are not peer-reviewed. The search strategy began by identifying search strings that were later combined to form keywords. First, a keyword consisting of the terms "management 3.0" and "leadership" was used. Considering the origin of the management 3.0 model in the agile methodologies, the search terms "agile" or "agility" and "leadership" or "management" were also added. After that, two more composite keywords were also included that result from the work of Appelo (2011) in which it is mentioned that two terms equivalent to the principles of management 3.0 are the autonomous and self-manageable teams. In this sense, the following compound search terms were defined: "self-managed" and "teams", and "autonomous", "management", and "teams".

3.3 Data collection

The process of collecting the publications was gathered by one of the researchers and mapped to an Excel document. After that, a division of the identified publications among the researchers was performed for abstract and full-text analysis. This process was carried out between 25th May 2020 and 17th July 2020. For each publication included in the final phase of this process we gathered information on: (i) the name of the authors; (ii) the title of the article; (iii) the source

(name of journal, conference, or book); (iv) the year of publication; (v) the indexation (i.e., WoS, Scopus, or both); (vi) classification of the study type (i.e., literature review, qualitative, quantitative, and mixed methods); (vii) the affiliation and country of the authors; (viii) summary of the main research questions answered by each study; and (ix) quality evaluation.

3.4 Quality assessment

Each study included in the SLR was independently and autonomously evaluated by each researcher. For this purpose, a Likert scale consisting of five levels (i.e. strongly disagree, disagree, undecided, agree, and strongly agree) was used. Three evaluation criteria as proposed by Mikalef et al. (2018) were adopted: (i) rigor, investigation methods were correctly applied; (ii) credibility, the results obtained are well presented and are discussed considering the literature in the area; and (iii) relevance, the study makes clear its theoretical and practical contributions to the community. This evaluation was carried out for all studies with full-text access. All studies with an average score below 3 were rejected.

RESULTS AND DISCUSSION

4.1 RQ1. What studies have been published on Management 3.0?

Figure 2 presents an overview of the evolution of the number of publications on management 3.0. This is an emerging theme with approximately 45% of publications in the area having been published in 2019. In the period 2010 to 2017, the number of publications is residual although constant over time. This means that although the theme has not been systematically addressed in the literature, some studies explore the phenomenon of management 3.0 from the perspective of managing self-organized teams and looking to its impact on organizations. Furthermore, most publications are published in journals (16), while the remaining are in international conferences (4), and books/book chapters (3).

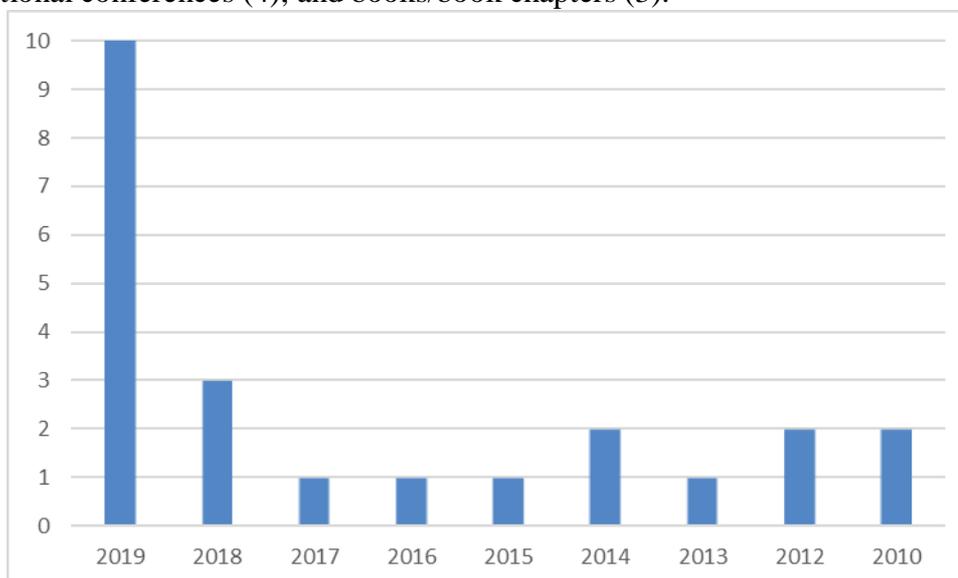


Figure 2. Evolution of publications

4.2 RQ2. What research topics do they explore?

Figure 3 shows that the most relevant research topics associated with management 3.0 are "organizational structure" and "work environment". Next are also the research topics associated

with "team performance" and "business process". These are important areas because they allow us to understand how self-managed teams emerge and how they can be sustainable. The performance of these teams has also been explored in the literature. Several studies like Benders et al. (2014), Carvalho et al. (2019), or Gutierrez et al. (2019) explore several themes simultaneously. On the opposite side, with less relevance emerge the research topics of "project management" and "technology support". Despite the relevance of project management, the self-managed teams promoted in the 3.0 management context are responsible for the way tasks are performed, taking away the verticality of the management system. The technologies adopted are similar to those we can find in the traditional paradigm of project management and are mainly aimed at sharing information, communication, and collaboration among team members.

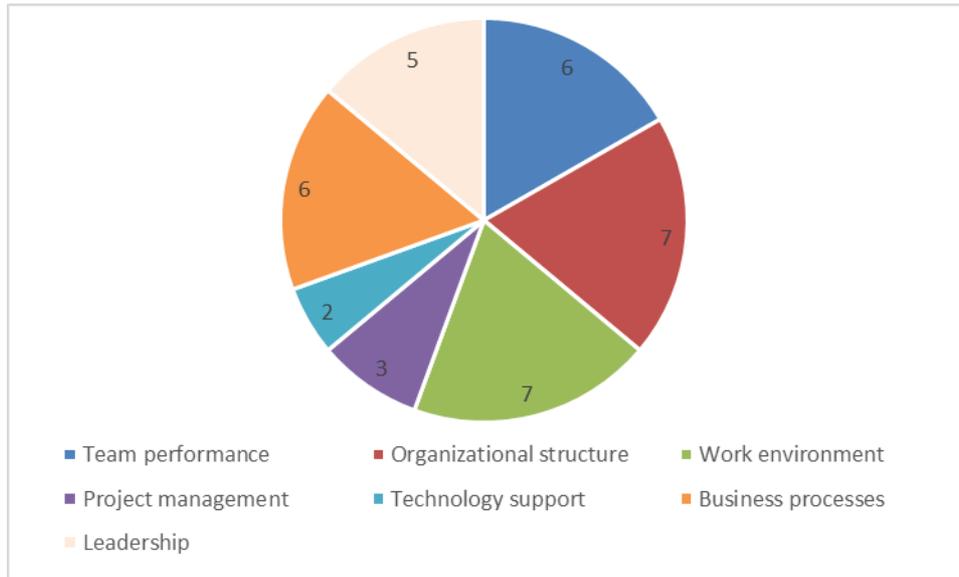


Figure 3. Research topics

4.3 RQ3. What is the adopted methodology?

Qualitative methodology through the adoption of methods such as case study, focus group, and action research has been the predominant methodology of studies in the area (Figure 4). Next, the quantitative methodology emerges in which surveys have been developed through linear and multiple regression models to characterize the relationship of the variables under study (e.g., operational excellence, team performance, productivity). Only three literature reviews were found that aim to explore in-depth the good practices and challenges posed by the implementation of self-managing teams. One of these literature reviews is an SLR that explores the self-managing team performance factors. It was not found any study using mixed methods.

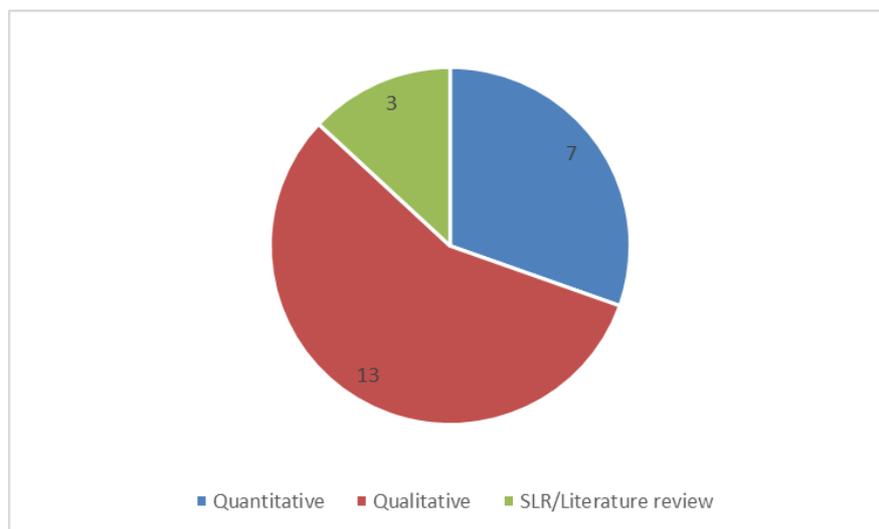


Figure 4. Adopted methodology

4.4 RQ4. Which are the main publishers in this field?

Emerald emerges as the main publisher in the field, followed by IEEE, SAGE, and Elsevier (Figure 5). However, the very diverse number of publishers and international conferences at which the studies are published indicate a high level of publisher receptivity to the 3.0 management theme. The papers tend to present both theoretical and practical contributions. This diversity of implications is an aspect that has been valued by publishers and associated reviewers.

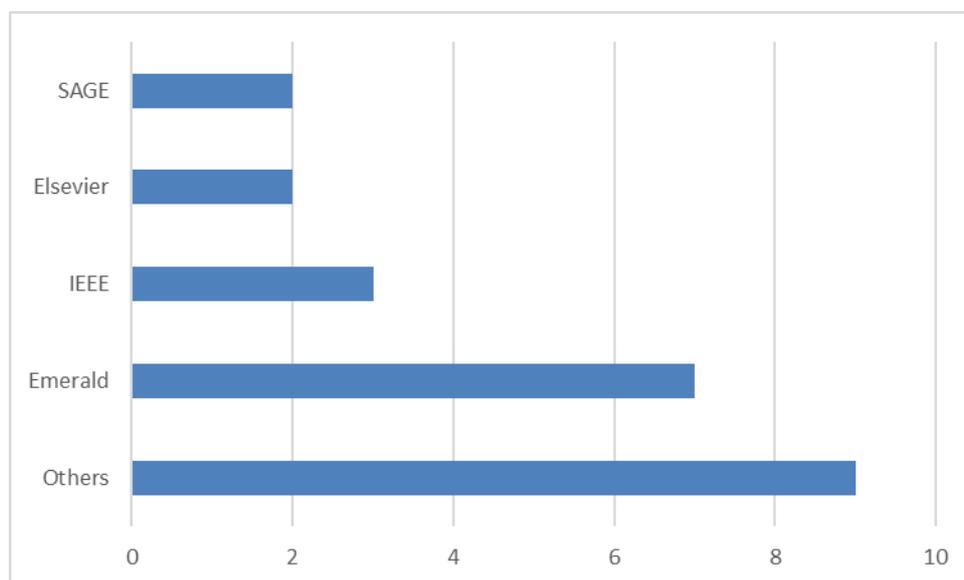


Figure 5. Main publishers

4.5 RQ5. Who is leading this research?

Authors from university institutions in the USA have been the main authors of studies in the area. Next, we encounter several European countries like the Netherlands, Germany, Spain, and Russia (Figure 6). However, when we group the different countries of Europe, we find that the number of researchers is clearly higher than in the USA. We note the low participation of Asian countries, which, with the exception of researchers from Malaysia concentrated on a single study, carried out studies in this field.

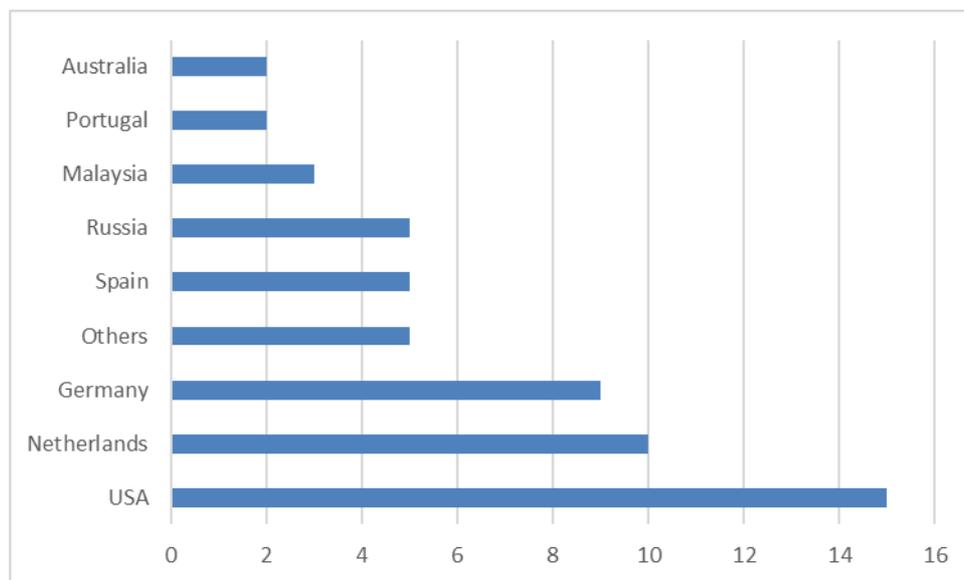


Figure 6. Countries leading this research

Discussion

Management 3.0 is not a methodology or framework that can be easily implemented following a set of steps. It encourages the creation of a new way of thinking and only works when put into practice in the daily actions of an organization. Research in the management 3.0 field is multidisciplinary and involves a wide range of domains, as shown in Figure 3. Studies published in the field explore mainly five dimensions: (i) organizational structure; (ii) work environment; (iii) team performance; (iv) business processes; and (v) leadership. From these dimensions, the cognitive map of Figure 7 was constructed, which allows the concise identification of the various research themes and the establishment of a research agenda in this area.

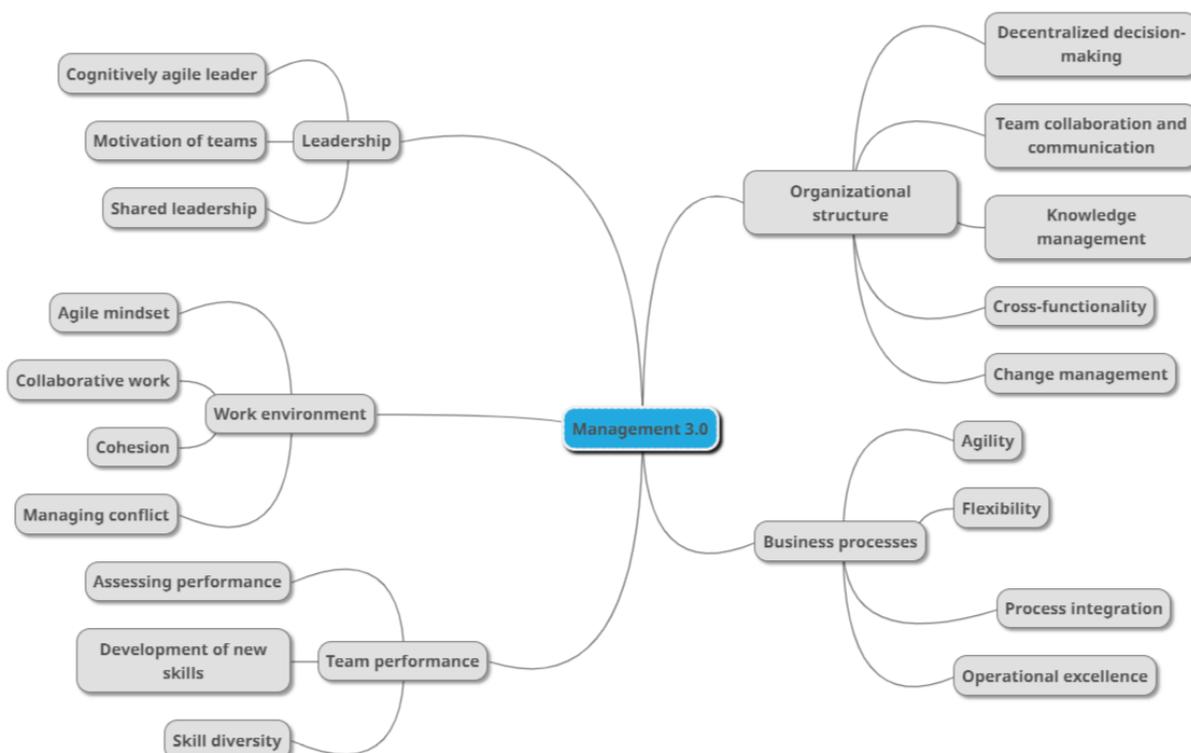


Figure 7. Research dimensions in the management 3.0 field

5.1 Theme 1: Organizational structure

The organization structure has been one of the main research areas in management 3.0 and has been explored in studies like Benders et al. (2014) and Kotter & Von Ameln (2019). The main purpose of management 3.0 is to change the traditional model of people management, which means to make companies rethink their organizational structure and processes. The intention is to make routines more productive. There are two concerns in this area: (i) to have an organizational structure that encourages the emergence and management of self-managed teams; and (ii) to have a structure that allows the company to grow with a focus on the quality of the collaborative environment. Decisions must be made in a decentralized way but without losing focus on the objectives of the organization. Collaboration within teams and inter-teams is another main area of investigation (Weerheim et al., 2019). Additionally, change management in the composition of teams and knowledge management processes allows these teams to grow with the organization (Kotter & Von Ameln, 2019).

5.2 Theme 2: Work environment

The workplace environment to be promoted in management 3.0 must be aligned with the organization's agile mindset. In 3.0 management, the focus is no longer on controlling the team, but on supporting and ensuring that there are no obstacles to everything flowing, ensuring an environment of trust in which everyone can be creative and work effectively together. In this sense, creativity should be stimulated in the collaborators and an ideal environment should be built in which everyone can collaborate towards the objectives of the organization. The existence of self-managed teams involves several risks, among which the cohesion of the teams and the visibility of the work developed by each of them (Markova & Perry, 2014). Conflict management becomes an activity that is resolved at a micro-level and in which Yazid et al. (2018) advocate that impediments must be quickly identified and more easily resolved.

5.3 Theme 3: Team performance

In this sphere, most studies focus on the adoption of models based on multi-level metrics that enable the assessment of individual and team performance (Magpili & Pazos, 2018). Setting goals for teams to achieve is a key strategy for the operation of management 3.0. Allowing teams to grow and evolve in their levels of maturity is another objective of management 3.0. Finally, the diversity of skills is also an important element to achieve high levels of maturity of teams. Teams need to have a balance between specialized, diversified, and complementary skills.

5.4 Theme 4: Business processes

Business processes in a management 3.0 environment must be both agile and flexible. The principles of 3.0 management and agile can be used simultaneously and combined with each other. Several examples of companies combining these two approaches can be found at Google, Pixar, and Zappos (Tran, 2017). The search for operational excellence can be reconciled with the principles of agility and flexibility promoted in management 3.0. Finally, another area of future research is the integration of processes, since one of the challenges is the integration of the work done by self-managed teams.

5.5 Theme 5: Leadership

Management 3.0 was initially developed with companies in the information and communication technology sector due to its alignment with the agile methodologies that gave rise

to this new management model. However, other segments are adopting the concept as a new approach to leading teams to achieve more agile organizations and more productive employees. To this end, one of the areas of research is linked to psychology and in which ways to energize people in organizations is being discussed. The goal is to keep employees active, motivated, and creative. Another research theme addressed by Paunova & Lee (2016) is shared leadership. This requires empowering teams, which requires autonomy and trust of managers.

CONCLUSIONS AND SUGGESTIONS

Conclusion

Management 3.0 is an emerging research area involving several multidisciplinary concepts and knowledge in management, leadership, information technology, and psychology. Data collected in this study led to the conclusion that the number of publications in this area has grown exponentially in recent years, particularly in 2019. Most of the studies in this area are qualitative and adopt a case-based approach, focus group, and action research. Quantitative studies that adopt surveys and explore the challenges posed to organizations by the adoption of management 3.0 practices can also be found. Research in this area has been mainly concentrated in European countries and USA.

Research future directions reflect the multidisciplinary vision of 3.0 management. There are several areas with high research potential. In the organizational structure, there are research topics related to the decentralization of decision-making, collaboration and communication between teams, the involvement of cross-functional teams, or knowledge management. In process management, there is a need to find models that balance the agility and flexibility characteristic of an agile environment with operational excellence. In team performance, it is necessary to find multi-level metrics that allow measuring the performance of self-managed teams and that promote the growth of these teams through the compatibility of skills development and their diversity. In the work environment, it is pertinent to look at team cohesion and ways of managing conflicts that can quickly recognize and mitigate these challenges. Finally, in the leadership theme, it is key to explore the challenges of shared leadership and motivation of teams throughout their growth process.

This paper offers both theoretical and practical contributions. From a theoretical viewpoint, it is the first work in management 3.0 that synthesizes the existing literature in the field and enables future research themes to be outlined. In the practical dimension, the results of this study are relevant for organizations that are beginning to adopt the management 3.0 paradigm. They help these organizations to understand and explore the potentialities of this approach and identify its main challenges. As future work, we intend to explore each of the dimensions identified as future research themes involving multidisciplinary teams from academia and companies. Since this is an area with a strong business emphasis, collaborative work between business and academia is fundamental to transfer and deploy research results in a business context.

REFERENCES

- Almeida F, Kennedy AJ, Lin B and Nowak IV (2019) Measuring innovation through a crowd source initiative. *International Journal of Innovation Science* 11(3): 471-488.
- Almeida F, Miranda E and Falcão J (2019) Challenges and facilitators practices for knowledge management in large-scale scrum teams. *Journal of Information Technology Case and Application Research* 21(2): 90-102.

- Appelo J (2011) *Management 3.0: Leading Agile Developers, Developing Agile Leaders*. Boston, MA: Addison-Wesley.
- Appelo J (2014) *Management 3.0 Workout*. Rotterdam, The Netherlands: Happy Melly Express.
- Azanha A, Argoud AR, Carmargo Junior J and Antonioli PD (2017) Agile project management with Scrum: A case study of a Brazilian pharmaceutical company IT project. *International Journal of Management Projects in Business* 10(1): 121-142.
- Benders J, Curseu PL and Van Hootegem G (2014) Themed issue: Longitudinal views on the development of self-managing teams. *Journal of Organizational Change Management* 27(2): 169-174.
- Bond-Barnard TJ, Fletcher L and Steyn H (2018) Linking trust and collaboration in project teams to project management success. *International Journal of Managing Projects in Business* 11(2): 432-457.
- Darmaki S, Omar R and Ismail W (2019) Driving Innovation: Reviewing the Role of Rewards. *Journal of Human Resource and Sustainability Studies* 7: 406-415.
- Daryani SM and Amini A (2016) Management and Organizational Complexity. *Procedia – Social and Behavioral Sciences* 230: 359-366.
- Diaconu M (2019) Management 3.0 The Role of an Agile Manager. Available at: <https://mozaicworks.com/blog/management-3-agile-manager/> (accessed 12 July 2020).
- Carvalho AM, Sampaio P and Rebentisch E (2019) On Agile Metrics for Operations Management: Measuring and Aligning Agility with Operational Excellence. In: *Proceedings of the 2019 IEEE International Conference on Industrial Engineering and Engineering Management (IEEM)*, Macao, China, pp. 1601-1605.
- Gerpott FH, Lehmann-Willenbrock N, Voelpel SC and van Vugt M (2019) It's Not Just What is Said, but When it's Said: A Temporal Account of Verbal Behaviors and Emergent Leadership in Self-Managed Teams. *Academy of Management Journal* 62: 717-738.
- Gong Y and Janssen M (2012) From policy implementation to business process management: Principles for creating flexibility and agility. *Government Information Quarterly* 29(1): 561-571.
- Gough D, Oliver S and Thomas J (2017) *An Introduction to Systematic Reviews*. Thousand Oaks, California: SAGE Publications.
- Grand S and Bartl D (2019) Making New Strategic Moves Possible: How Executive Management Enacts Strategizing Routines to Strengthen Entrepreneurial Agility. *Research in the Sociology of Organizations. Routine Dynamics in Action: Replication and Transformation* 1(61): 123-151.
- Groeger L, Bruce K and Rolfe I (2019) Adapt fast or die slowly: Complex adaptive business models at Cisco Systems. *Industrial Marketing Management* 77: 102-115.
- Gutierrez G, Garzas J, Gonzalez MT and Moguerza JM (2019) Self-Managing: An Empirical Study of the Practice in Agile Teams. *IEEE Software* 36(1): 23-27.

- Hanaysha J (2016) Examining the Effects of Employee Empowerment, Teamwork, and Employee Training on Organizational Commitment. *Procedia – Social and Behavioral Sciences* 229: 298-306.
- Hidalgo ES (2019) Adapting the scrum framework for agile project management in science: case study of a distributed research initiative. *Heliyon* 5(3): 1-32.
- Johnson J and Kruse S (2019) *Educational Leadership, Organizational Learning, and the Ideas of Karl Weick*. New York: Routledge.
- Korge A (2017) Agile Organization and Leadership 4.0. *ZWF* 112(5): 289-292.
- Kotter J and von Ameln F (2019) Agility, hierarchy and lessons for the future. John Kotter on the legacy and future of Change Management. *GIO* 50: 111-114.
- Lederer M, Schmidt W and Popova, O (2019) Synthesis of Design Parameters for the Transfer of Agility from Software Engineering to Process Management. In: *Proceedings - 45th Euromicro Conference on Software Engineering and Advanced Applications (SEAA)*, Kallithea-Chalkidiki, Greece, pp. 426-433.
- Lubis H, Pratama K, Pratama I and Pratami A (2019) A Systematic Review of Corporate Social Responsibility Disclosure. *International Journal of Innovation, Creativity and Change* 6(9): 415-428.
- Magpili NC and Pazos P (2017) Self-Managing Team Performance: A Systematic Review of Multilevel Input Factors. *Small Group Research* 49(1): 3-33.
- Markova G and Perry TJ (2014) Cohesion and individual well-being of members in self-managed teams. *Leadership & Organization Development Journal* 35(5): 429-441.
- Mikalef P, Pappas IO, Krogstie J and Giannakos M (2018) Big data analytics capabilities: a systematic literature review and research agenda. *Information Systems and e-Business Management* 16: 547-578.
- Millikin JP, Hom PW and Manz CC (2010) Self-management competencies in self-managing teams: Their impact on multi-team system productivity. *Leadership Quarterly* 21(5): 687-702.
- Obydenov A (2019) Business agility: Parametric strategic management concept meets agile methods. In: *Proceedings of the 33rd International Business Information Management Association Conference (IBIMA)*, Granada, Spain, pp. 4221-4223.
- Parker DW, Holesgrove M and Pathak R (2015) Improving productivity with self-organised teams and agile leadership. *International Journal of Productivity and Performance Management* 64(1): 112-128.
- Paunova M and Lee YT (2016) Collective Global Leadership in Self-Managed Multicultural Teams: The Role of Team Goal Orientation. In: J. Osland (Ed.), *Advances in Global Leadership* (pp. 187-210). Bingley, UK: Emerald Group Publishing Limited.
- Perry EE, Karney DF and Spencer DG (2013) Team establishment of self-managed work teams: a model from the field. *Team Performance Management* 19(1/2): 87-108.

- Piccarozzi M, Aquilani B and Gatti C (2018) Industry 4.0 in Management Studies: A Systematic Literature Review. *Sustainability* 10(10): 1-24.
- Przybilla L, Wiesche M and Krcmar H (2019) Emergent Leadership in Agile Teams - an Initial Exploration. In: *Proceedings of the 2019 on Computers and People Research Conference*, New York, USA, pp. 176-179.
- Schwertner K (2017) Digital Transformation of Business. *Trakia Journal of Sciences* 15(1): 388-393.
- Sinha N and Matharu M (2019) A comprehensive insight into Lean management: Literature review and trends. *Journal of Industrial Engineering and Management* 12(2): 302-317.
- Strelnikova TV, Borisov AF, Ovsianikov VG and Bystriantsev PS (2018) Peculiarities of Communication Processes in Self-Managed Work Team. In: *European Proceedings of Social and Behavioural Sciences EpSBS*, Tomsk, Russia, pp. 1333-1338.
- Tran SK (2017) GOOGLE: a reflection of culture, leader, and management. *International Journal of Corporate Social Responsibility* 2(1): 1-14.
- Tranfield D, Denyer D and Smart P (2003) Towards a methodology for developing evidence-informed management knowledge by means of systematic review. *British Journal of Management* 14: 207–222.
- Van der Vegt G, Bunderson S and Kuipers B (2010) Why Turnover Matters in Self-Managing Work Teams: Learning, Social Integration, and Task Flexibility. *Journal of Management* 36(5): 1168-1191.
- Walker D (2012) Making Sense of Agile Project Management Balancing Control and Agility. *International Journal of Managing Projects in Business* 5(1): 158-161.
- Weerheim W, Van Rossum L and Ten Have WD (2019) Successful implementation of self-managing teams. *Leadership in Health Services* 32(1): 113-128.
- Yazid Z, Osman LH and Hamid RA (2018) Managing conflict in the self-managed project team. *International Journal of Business and Management Science* 8(2): 405-422.
- Zurub HH, Ionescu A and Bob N (2015) Business versus Complexity. *Procedia Economics and Finance* 32: 360-366.