Job Crafting: A Bibliometric Analysis of the Published Research Works

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Abstract

On the post-pandemic work scene there is an increased desire of flexibility and individual job design. As such, the purpose of present endeavour is to grasp a better understanding of the phenomena, by performing a scientific evolution analysis, in the business management research field.

To navigate through significant number of publications and to visually present the current state of research, trends and future research directions, a sophisticated bibliometric analysis has been implemented. We opted to merge relevant findings from Scopus and Web of Science databases with the help of in-house developed R programming language code, enabled within RStudio. The collated results were further analysed with the help of VOSviewer software and revealed an intellectual distribution map and a geographical influence map in academic research on job crafting in business and management.

Keywords: Job crafting, work trends, flexibility, COVID-19, bibliometric analysis.

JEL classification: J 17, J 24, J 62 **DOI:** 10.24818/RMCI.2022.4.525

1. Introduction

According to significant research findings aimed at unveiling the workshifting attitudes enabled during and after the COVID-19 pandemic, a considerable share of the work market actors are fully onboarded on a quest for work reconfiguration (Deloitte, 2021; EY, 2021; McKinsey, 2021). COVID-19 generated a complex crisis with multiple consequences (Bratianu, 2020). As highlighted by the McKinsey "The future of world after COVID-19 report" (2021), the workforce landscape after the COVID-19 pandemic is not the same as the one it replaced.

Labour market implications of the global pandemics indicate exaltation of previous niche behaviours, such as the great resignation phenomena, coined by Klotz (2022), the knowmadic work phenomena, introduced by Moravec (2008), or the infinite bricolages of alternative work arrangements. Out of them, we mention the heavy adoption of teleworking (Holliss, 2021), mobility "en-masse" (EY,

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2021), or working from anywhere based on self-management (Bratianu, Iliescu & Paiuc, 2021; Rodríguez-Modroño, 2022). According to the EY Work Reimagined Employee Survey (2021), 54% of employees stated that they are likely to give up their current job unless provided the sought-after flexibility. Moreover, a tremendous 90% of the 16.000 employees surveyed in more than 16 countries across different industries are looking for flexibility in their professional location and time (EY, 2021). In this context, the previously scarce knowmadic behaviour (Beck et al., 2013) infiltrates knowledge-intensive workers' masses, as traditional work boundaries are demolished (Iliescu, 2021a). Furthermore, in June 2022, more than 3.000 employees of 70 UK enterprises onboarded an unprecedented pilot program of a four-day work week, with no loss pay, involving Cambridge University, Boston College, and Oxford University researchers. By the time the UK pilot program ends in November 2022, the United States and Canada pilot program will be launched. Unparalleled volumes of data focused on work flexibility, productivity, and non-linearity (Bratianu & Vasilache, 2009) will, in this way, become available to researchers.

All these potential futures of work have in common a thirst for reimagining, rearranging, and re-contextualizing work (Deloitte, 2021; EY, 2021; McKinsey, 2021). Job crafting becomes a new competence in the quest for sought-after flexibility, independence, autonomy, and increasing knowledge entropy (Bratianu, 2019; Bratianu, Vatamanescu *et al.*, 2021). Job crafting implies a clear vision of the immediate future and the ways in which knowledge workers can increase their satisfaction due to a new life-work balance.

The present research aims to provide a detailed understanding of the current state of research and the scientific evolution of the job crafting concept. The targeted outcome is to present a comprehensive analysis of the academic research landscape of the topic in the business management field. To identify the evolution of the scholar's interest, potential future research directions, and current trends, we will work with significant volumes of data by enabling bibliometric analysis. We will integrate Scopus and Web of Science (WoS) publications datasets with the help of R language programming and the VOSviewer software. We will run a keyword co-occurrence analysis and a country co-authorship analysis on all-time worldwide publications meeting our search criteria.

The structure of this paper is the following: after this first introduction and motivation section, a literature review summary will follow, succeeded by the methodology overview. Section 4 will cover research findings and discussions, and finally, in Section 5, formulated conclusions will be presented.

2. Literature review

First, as defined by Ilgen and Hollenbeck (1992), a job represents a group of activities and interactions delegated for implementation to a worker. Along these lines, traditional research on jobs was built on the premise that work design is an activity external to the workers, outside of their attributes, while they passively receive the tasks and assignments (Wrzesniewski *et al.*, 2013).

In opposition to the traditional perspective, the job crafting concept has been introduced and it gained importance in the academic literature, mainly in the psychology and business management fields (Bakker & Demerouti, 2007; Demerouti *et al.*, 2001; Grant *et al.*, 2010; Lyons, 2008; Tims & Bakker, 2010; Tims *et al.*, 2012; Wrzesniewski & Dutton, 2001). Wrzesniewski and Dutton (2001) defined job crafting as the "physical and cognitive changes individuals make in the task or relational boundaries of their work" (p.179). In their view, the final objective of the new proactively assumed responsibility of writing the personal job story consists of the sense of meaning it provides. By taking a step forward from just completing assignments, workers increase their independence and feel empowered by designing the way they work.

From a complementary standpoint, Lyons (2008) identifies another meaning of job crafting. More specifically, the author focuses on the mission of acquisition of work-related knowledge and competencies, where employees onboard proactively. The key idea resides in the decreased external responsibility, traditionally represented by the employer, and the increased internal drivers manifested through the desire for professional self-development and fulfillment. In this job crafting scenario, the worker plays a central role in his skills development.

By mixing the two previous perspectives, Tims and Bakker (2010) present job crafting as the sum of adjustments that an individual implements to his professional environment to calibrate personal skills and values, on one side, and job demands and resources, on the other side. Tims and Bakker's perspective is also valuable from the theory of knowledge fields perspective, as it integrates rational, emotional, and spiritual knowledge components (Bratianu, Vatamanescu et al., 2021).

The job demand-resources (JD-R) model represents a significant advancement and reading key of the job crafting concept understanding due to the connection it builds with the well-being concept (Bakker & Demerouti, 2007; Demerouti et al., 2001). As Bakker and Demerouti (2007) indicate, research proves that "job demands such as high work pressure, emotional demands, and role ambiguity may lead to sleeping problems, exhaustion and impaired health" (p. 309). Developing on the topic, Berg, Grant and Johnson (2010) highlight that employees who enable job crafting in their professional activities might possess correlated increased well-being scores. As Tims, Bakker and Derks (2012) add, positive effects also aim for employers' involvement and success. Through a comprehensive study, Tims, Bakker and Derks (2013) prove that job crafting engagement positively impacts work resourcefulness, contributing to employee well-being.

3. Methodology

The present research aims to provide a detailed understanding of the current state of research and the scientific evolution of the job crafting concept. The methodology of the present research is summarised in Figure 1. To grasp a

better understanding of the job crafting business management research, we opted for a bibliometric analysis using VOSviewer version 1.6.17 software (Van Eck & Waltman, 2010, 2011, 2020, 2021) enhanced in RStudio by R (Allaire, 2012; Gandrud, 2018; Verzani, 2011).

First, we established the Scopus and WoS databases as data sources for our analysis. The selected databases are Scopus and WoS, recognized as the most relevant and recommendable data sources for such research (Janik, Ryszko & Szafraneic, 2021; Li, Rollins & Erjia, 2017; Van Eck & Waltman, 2010, 2011, 2020, 2021). In the selected databases, we enabled Boolean search by focusing on the "job crafting" concept and restricting the fields to business OR management to ensure relevance in our digital data navigation (Frants *et al.*, 1999).

Next, the geographical and timeframe coordinates have been established, and the author has chosen not to limit them. As such, all-time worldwide publications have been considered. Nevertheless, the search has been refined by documents with titles and abstracts in English. All document types have been considered, and detailed datasets have been exported from both Scopus and WoS, including titles, abstracts, information about the authors, and citation information on the 31st of July 2022.

After this process, we obtained detailed records of 487 Scopus documents and 453 WoS documents, which are thoroughly analyzed in the upcoming Section 4. Results and discussions. Nevertheless, we refined the databases even more by merging them prior to running the bibliometric analysis. By enabling RStudio features, and an R code, we combined the two different databases into one and obtained a total of 940 documents. We finalized the obtained database by eliminating 44 duplicate references, leaving us with 896 documents for VOSviewer analysis.

R is a computer programming language developed for statistical analysis and predictions. The reasons for our option refer to the relevance of the method in the field, the opportunity to manage a large amount of data and extract valuable knowledge, and the increased reliability (Donthu *et al.*, 2021; Echchakoui, 2020; Janik *et al.*, 2020, 2021). As Echchakoui details (2020), when researchers choose to work with data extracted from two databases, they generally tend to create two different analyses. Nevertheless, employing extensive research within Scopus and WoS, the author proves that merging the databases before examining them increases the findings' reliability.

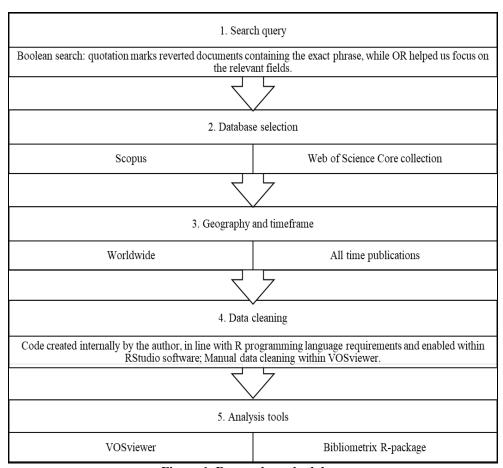


Figure 1. Research methodology Source: Authors' own research

Before initiating the VOSviewer analysis, a less common yet essential step of bibliometric analysis has been implemented: data cleaning (Van Eck & Waltman, 2020). Researchers frequently skip this step because of the difficulty of reviewing the keywords data lake and manually implementing data cleaning. For the present research, the author revised 1417 keywords and eliminated the terminology related to the academic field, methodology research, or empty meaning frequent terms, which often create statistical noise (Iliescu, 2021b). Also, similar concepts have been unified (e.g., "productivity" and "work productivity").

4. Results and discussions

The document type distribution of the identified documents is the following: in Scopus, from the total of 487, 84.5% (404) are articles, 5% (24) are book chapters, 3.8% (18) are reviews, 3.6% (17) are conference papers, and the remaining 3.1% are books, conference reviews, and notes; in WoS database, from

the total of 453, 88.1% (400) are articles and the rest 11.9% are book chapters, reviews, or editorial materials.

The job crafting research references identified in the business management academic field represent most publications on both databases: 52.6% on Scopus and 88.9% on WoS. In the business and management field, the most proliferent researchers are Bakker, A.B. (39 on Scopus and 24 on WoS), Demerouti, E. (26 on Scopus and 23 on WoS), Tims, M. (19 on Scopus and 12 on WoS), Derks, D. (12 on Scopus and 7 on WoS), Petrou, P. (9 on Scopus and 9 on WoS), Luu, T.T. (8 on Scopus and 9 on WoS), followed by many others. The rest of the topics' documents are part of categories such as psychology, social sciences, or behavioural sciences.

Table 1. Publications overview in Scopus vs. WoS

Search	Database/	Oldest available	Total	Publications weight per
item	Field(s)	publication	findings	year (evolution)
"Job	Scopus	1991	487	2022 − 19% (↗)
crafting"		International	documents	2021 − 17% (↗)
	"Business,	Journal of	English	2020 − 11% (১)
	Management	Value-Based	language	2019 – 12% (*/)
	and	Management		2018 – 8% (–)
	Accounting"	United States		2017 – 8%
				1991 - 2016 - 25%
"Job	WoS	1979	453	2022 – 11% (\(\sigma\)
crafting"		Journal of	documents	2021 – 18% (🗷)
	"Management"	Applied	English	2020 – 15% (*/)
	OR	Psychology	language	2019 – 13% (7)
	"Business"	Canada		2018 – 8% (–)
				2017 – 8%
				1979 - 2016 - 27%

Source: Authors' own research

In Table 1, we summarized the number of total findings in each database, the oldest publication available, and the research weight and trends per year. As such, while the Scopus number of publications over the past two years has significantly increased, the WoS publications evolution had a slight increase in 2021 and decreased in 2022. A visual representation of the comparison is included in Figure 2.

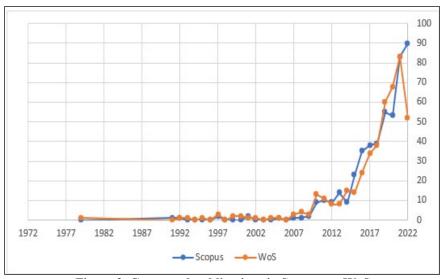


Figure 2. Compared publications in Scopus vs. WoS

Source: Authors' own research

Also, within the preliminary screening of the bibliometric findings, we identified the United States, Netherlands, and China as the top three publication countries for both databases, with corroborated wights of 56% (WoS) respectively 53% (Scopus) of the total allocated publications. More details about countries' coauthorship results are presented in Section 4.2.

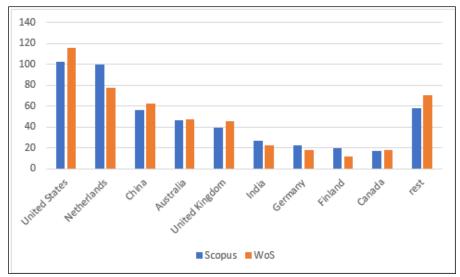


Figure 3. Publishing countries' distribution in Scopus vs. WoS

Source: Authors' own research

4.1 Co-occurrence of keywords analysis

After databases merged and 44 duplicates were removed in RStudio, we obtained a stock of 1417 keywords. The findings were further refined before bibliometric analysis utilizing manual data cleaning. When working with concept representation within documents, it is vital to ensure that empty-meaning items are removed from the relevant data feed. After data cleaning, we worked with 1366 keywords, of which only 46 met the minimum number of occurrences threshold of 5 per keyword.

The visual representation of the 46 keywords displays a total of 20 clusters created by the VOSviewer software based on the assessment of their fundamental value. Each collection holds 1 item, except for Cluster 1 (red color), which contains 26 items, and Cluster 2 (green color), which holds two keywords. The job crafting scientific network has a doubled layered lotus shape with the search item at the center. A first, smaller lotus flower is represented by the 25 elements tangential to job crafting, located at a first proximity level. The second, larger lotus flower, is represented by the remaining 20 items that act as pivots anchoring the network's core in a broader intellectual environment.

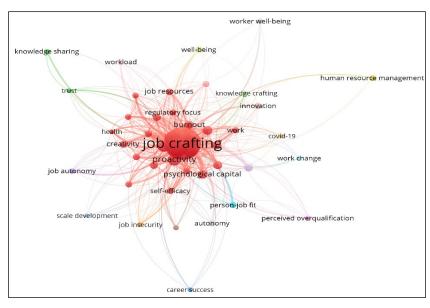


Fig ure 4. Net wor k visu aliz atio n of com bine d Sco pus and Wo S

databases

Source: Authors' own research

In Table 2, we have chosen to present Cluster 1 keywords by topic, since we identified seven different directions covered in the business and management academic resources available on Scopus and WoS: the J-DR model of job crafting, work-related coordinates, and arguments; main benefits of job crafting; main threats that it tackles; the resourcefulness of the job crafting practices; servant and

transformational leadership role as mediators and the assets of regulatory focus and self-efficacy.

Table 2. Cluster 1 items and key values

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Keyword	Occurrences	Links	Total link strength			
job crafting; job demands-resources model	338; 46	45; 35	581; 184			
work engagement; work performance;	104; 39; 36;	17; 35; 35;	314; 184; 154;			
worker; work behavior; work environment;	41; 11; 10; 9	35; 30; 17;	150; 132; 45;			
work; work design		17; 13	34; 30			
Proactivity; commitment; satisfaction;	36; 20; 16;	33; 26; 25;	121; 70; 62;			
motivation; creativity; job satisfaction	13; 12; 17	24; 17; 21	55; 40; 51			
Burnout; health	17; 5	20; 20	69; 36			
Resources; psychological capital; job	12; 20; 11	20; 21; 15	63; 52; 30			
resources						
Mediation; leadership; servant leadership;	11; 14; 8; 8	24; 21; 18;	54; 52; 37; 32			
transformational leadership		15				
regulatory focus; self-efficacy	9; 10	21; 18	43; 38			

Source: Authors' own research

Out of them, job crafting and work engagement have the top two highest occurrences values, indicating the weight of the academic interest in this respect (51%). The remaining 24 keywords of Cluster 1 have significantly fewer occurrence values, between 8 and 46. Nevertheless, due to their strong interconnection, their link and link strength values are arguments for cluster aggregation. With the help of VOSviewer bibliometric analysis, we visually observe the intellectual fabric of the job crafting concept in business research management.

Table 3. Cluster 2 items and key values

Keyword	Occurrences	Links	Total link strength
knowledge sharing	6	20	9
Trust	5	9	14

Source: Authors' own research

In the present research, Cluster 2 acts as a pivot for job creation in the knowledge sharing and trust constructs. In Table 3, we present the Cluster 2 items and key values. When assessing link values, we understand that location on the network map is ensured by 20 (knowledge sharing) and 9 (trust) direct interconnections.

Table 4. Clusters 3 to 20 items and key values

Keyword	Occurrences	Links	Total link strength	Cluster
career success; person-job fit	5; 10	6; 11	8; 21	3; 6
job autonomy; autonomy	6; 9	11; 8	15; 18	5; 20
job insecurity; workload	5; 6	11; 8	16; 15	7; 18
self-determination theory	6	9	15	8
perceived overqualification	6	8	10	9
empowering leadership; HR	9; 8	14; 3	25; 5	10; 4
management				
knowledge crafting;	5; 10	12; 10	17; 19	11; 17
innovation				
scale development;	5; 15	8; 10	13; 26	12; 14
meaningful work				
well-being; worker well-being	9; 7	9; 4	15; 8	13; 19
work change; covid-19	6; 5	8; 9	13; 15	15; 16

Source: Authors' own research

Finally, in Table 4, we present the remaining 18 clusters segregated into individual clusters. These items visually outline the larger lotus flower and expand the scientific coverage of the job crafting research. The visual distribution between the larger lotus items indicates a balanced intellectual representativity for all individual items. At the same time, even if subtle, it is valuable to our analysis to acknowledge the distance variations between items. The closer the items on the map, the stronger their relationship is in the literature.

Generally, items in the larger lotus concepts received less attention than items in the smaller lotus flower. They represent potential future research directions on the job crafting topic in the business management field. More specifically, our findings suggest that relationships between job crafting and worker well-being, career success, knowledge sharing, or human research management would benefit from increased research and scholars' analysis. The overlay visualization feature of VOSviewer helps us understand how scientific interest trends evolved. From Figure 3, we find that in the peak publications period (2017 to 2020 and after), the interest grew as follows:

- ➤ During 2017 (purple), the relationship between job crafting and burnout, HR management, and work of regulatory focus was of interest.
- As of 2018 (blue), the focus shifted to proactivity, self-efficacy, scale development, job insecurity, work change, job resources, and innovation.
- Advancing toward 2019 (green), business management research on the same topic integrated the concepts such as creativity, productivity, and workload.
- Recent research (yellow) emphasizes knowledge sharing, trust, job autonomy, perceived overqualification, knowledge crafting, COVID-19, and worker well-being.

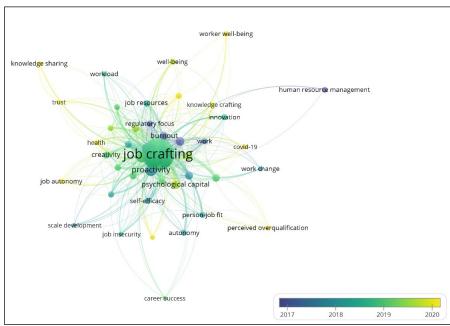


Figure 5. Overlay visualization of combined Scopus and WoS databases Source: Authors' own research

Based on the overlay mapping, we understand that, due to their novelty, the distanced yellow, green, and blue items are likely to be developed and migrate closer to the map centre. As such, they represent potential future research directions in business management.

4.2 Countries co-authorship

For the co-authorship analysis, 26 countries have been considered relevant, having more than 5 publications associated with their labels. Within this analysis, the maximum number of documents considered is 604, with a total of 20,307 citations.

Table 5. Cluster 2 items and key values

Table 5: Cluster 2 items and key values						
Country	Documents	Documents weight	Citations	Citations weight		
Netherlands	109	18%	7237	36%		
United States	100	17%	3568	18%		
China	59	10%	908	4%		
Australia	44	7%	1539	8%		
United Kingdom	38	6%	676	3%		
India	27	4%	184	1%		
Finland	19	3%	637	3%		
Germany	19	3%	985	5%		
Canada	17	3%	1060	5%		

Country	Documents	Documents weight	Citations	Citations weight
Remaining 17	172	28%	3513	17%
Total	604	100%	20307	100%

Source: Authors' own research

The main findings of country co-authorship analysis provide meaningful insights into the most influential countries where the specific research topic is being studied. In our case, Dutch studies are highly significant, having more than 7.200 associated citations in the literature (43%), followed by American studies having half of the Dutch citations (21%).

We see how relevant the merge of the two databases becomes, as the unexpected prevalence of Netherlands occurs, over the United States' research activity. Without merging databases and removing duplicate references, the results of bibliometric analysis might be negatively impacted, leading the researcher toward inaccurate conclusions. In both individual databases, US publication quotas were prevailing the Netherlands ones. Moreover, the weight of Dutch, American, and Chinese publications individually in Scopus was 53% and in WoS was 56%. Nevertheless, according to VOSviewer's analysis of merged databases excluding duplicates, the group's new weight is 44%. We can conclude from this difference that out of the 44 duplicates, a large share was represented by Dutch, American, or Chinese publications, which is reasonable if we acknowledge their popularity and impact. On the other hand, it is less likely for a low-impact publication to be part of the duplicates.

Table 5 findings are visually represented in Figure 6 below, capturing network visualization of countries' co-authorship analysis within the VOSviewer software.

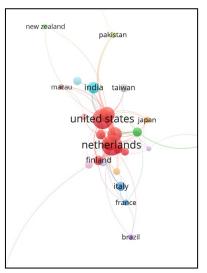


Figure 6. Network visualization of countries' co-authorship findings Source: Authors' own research

Conclusions

Through this bibliometric study, we obtained significant academic knowledge advancement on job crafting and its future trends. We obtained a detailed overview of the job crafting research in the business management field, identifying a two-layered pivotal intellectual fabric. The topic is firmly anchored in the literature, as shown by the WoS and Scopus databases, but the scholars' interest has been ununiform, sophisticated, and divergent. Therefore, we obtained a two-layered lotus distribution of conceptual associations. In this regard, we identified potential future research direction and further development in the job autonomy, knowledge sharing, and well-being impacts of job crafting.

Job crafting has been reinvented due to the COVID-19 crisis and the exponential increase of teleworking and the transformation of many knowledge workers into knowmads who practice self-management and a different view of the job-market. Also, job crafting was stimulated recently by the new type of jobs and competencies generated by the digitalization phenomena.

Following the findings of Echchakoui (2020), we compared the statistical results of individual WoS and Scopus premises with combined analysis findings. The results demonstrate that significant differences can occur if database merging is not considered within the bibliometric analysis of two or more sources. Thus, the contribution of the present paper comes from both the method of analysis used and the interpretation of the data we got concerning the dynamics of job crafting phenomena.

References

- 1. Allaire, J. (2011). RStudio: Integrated development environment for R. In: *The R User Conference, useR!*, p. 14.
- 2. Bakker, A. B. & Demerouti, E. (2007). The job demands—resources model: State of the art. *Journal of Managerial Psychology*, Vol. 22, pp 309-328. DOI: 10.1108/026839407733115
- 3. Beck, K., Ilieva, R., Pullman, A., & Zhang, Z. (2013). New work, old power: inequities within the labor of internationalization. *On the Horizon*, Vol. 21, pp. 84-95. DOI: 10.1108/10748121311322987.
- 1. Berg, J. M., Grant, A. M., & Johnson, V. (2010). When callings are calling: Crafting work and leisure in pursuit of unanswered occupational callings. *Organization Science*, Vol. 21, pp. 973-994.
- 2. Bratianu, C. (2019). Exploring knowledge entropy in organizations. *Management Dynamics in the Knowledge Economy*, Vol. 7, Issue 3, pp. 353-366. DOI: 10.1108/MD-05-2019-0559.
- 3. Bratioanu, C. (2020). Toward understanding the complexity of the COVID-19 crisis: a grounded-theory approach. *Management & Marketing. Challenges for the Knowledge Society*, Vol. 15, Issue S1, pp. 410-423. DOI: 10.2478/mmcks-2020-0024.
- 4. Bratianu, C. & Paiuc, D. (2022). A bibliometric analysis of cultural intelligence and multicultural leadership. *Review of International Comparative Management*, Vol. 23, Issue 2, pp. 319-337. DOI: 10.24818/RMCI.2022.3.319.

- Bratianu, C. & Vasilache, S. (2009). Evaluating linear-nonlinear thinking style for knowledge management education. *Management & Marketing*, Vol. 4, Issue 3, pp. 3-18.
- 6. Bratianu, C., Iliescu, A.N. & Paiuc, D. (2021). Self-management and cultural intelligence as the new compentencies for knowmands. In: Bezzina, F. (Ed.). *Proceedings of the 17th European Conference on Management, Leadership, and Governance* (pp. 90-96). University of Malta, Valletta, Malta, 8-9 November 2021.
- 7. Bratianu, C., Vatamanescu, E.M., Anagnoste, S. & Dominici, G. (2021). Untangling knowledge fields and knowledge dynamics with the decision making process. *Management Decision*, Vol. 59, Issue 2, pp. 306-323. Doi: 10.1108/MD-05-2019-0559.
- 8. Deloitte (2021). From survive to thrive. The future of work in a post-pandemic world [Online]. Available at: https://www2.deloitte.com/content/dam/Deloitte/global/Documents/HumanCapital/gx-the-future-of-work-post-covid-19-poc.pdf [Accessed 2 August 2022].
- 9. Demerouti, E., Bakker, A. B., Nachreiner, F. & Schaufeli, W. B. (2001). The job demands—resources model of burnout. *Journal of Applied Psychology*, Vol. 86, pp. 499-512. DOI: 10.1037/0021-9010.86.3499.
- 10. Donthu, N., Kumar, S., Mukherjee, D., Pandey, N. & Lim, W.-M. (2021). How to conduct a bibliometric analysis: An overview and guidelines. *Journal of Business Research*, Vol. 133, pp 285–296. DOI: 10.1016/j.busres.2021.04.070.
- 11. Echchakoui, S. (2020). Why and how to merge Scopus and Web of Science during bibliometric analysis: the case of sales force literature from 1912 to 2019. *Journal of Marketing Analytics*, pp. 8165-8184.
- 12. EY, (2021). Work reimagined employee survey 2021 [Online]. Available at: https://www.icmif.org/wp-content/uploads/2021/06/ICMIF-EY-Work-Reimagined-Presentation-June-2021.pdf [Accessed 2 August 2022].
- 13. Frants, V. I., Shapiro, J., Taksa, I. & Voiskunskii, V. G. (1999). Boolean search: current state and perspectives. *Journal of the American Society of Information Science*. Vol. 50, Issue 1, pp. 86-95.
- Gandrud, C. (2018). Reproducible research with R and RStudio. Boca Raton, FL: CRC Press
- 15. Grant, A. M., Fried, Y., Parker, S. K. & Frese, M. (2010). Putting job design in context: introduction to the special issue. *Journal of Organizational Behavior*, Vol. 31, pp. 145-157. DOI: 10.1002/job.679.
- 16. Holliss, F. (2021). Working from home. *Built Environment*, Vol. 47, pp. 367-379. Doi:10.2148/benv.47.3.367.
- 17. Ilgen, D. R. & Hollenbeck, J. R. (1992). The structure of work: job design and roles. In: Dunnette, M. & Hough, L. (Eds.), *Handbook of industrial and organizational psychology* (pp. 165–207). Palo Alto, CA: Consulting Psychologists Press.
- 18. Iliescu, A. N. (2021a). The emergence of knowmads from the knowledge workers. *Management Dynamics in the Knowledge Economy*, Vol. 9, Issue 1, pp 94-106. DOI 10.2478/mdke-2021-0007.
- 19. Iliescu, A.N. (2021b). Knowledge mapping of the knowmad concept a text mining analysis. In: Bratianu, C., Zbuchea, A., Anghel, F. & Hrib, B. (Eds.) Proceedings of the *STRATEGICA International Academic Conference*, 21-23 October 2021, Bucharest, Romania, pp. 958-968.

- 20. Klotz, A. (2022). The great resignation is still here, but whether it stays is up to leaders [Online]. Available at: https://www.oecd-forum.org/posts/the-great-resignation-is-still-here-but-whether-it-stays-is-up-to-leaders [Accessed 2 August 2022].
- 21. Janik, A., Ryszko, A. & Szafraniec, M. (2020). Scientific landscape of smart and sustainable cities literature: a bibliometric analysis. *Sustainability*, Vol. 12, p. 779. DOI: 10.3390/su12030779.
- 22. Janik, A., Ryszko, A. & Szafraniec, M. (2021). Exploring the social innovation research field based on a comprehensive bibliometric analysis. *Journal of Open Innovation: Technology, Marketing and Complexity*, Vol. 7, pp. 226-230. DOI: 10.3390/joitmc7040226.
- 23. Li, K., Rollins, J. & Erjia, Y. (2017). Web of Science use in published research and review papers 1997-2017: a selective, dynamic, cross-domain, content-based analysis. *Scientometrics*, Vol. 115, pp. 1-20.
- 24. Lyons, P. (2008). The crafting of jobs and individual differences. *Journal of Business Psychology*, Vol. 23, pp. 25-36. DOI: 10.1007/s10869-008-9080-2.
- 25. McKinsey (2021). *The future of world after COVID-19 report* [Online]. Available at: https://www.mckinsey.com/featured-insights/future-of-work/the-future-of-work-after-covid-19 [Accessed 2 August 2021].
- 26. Moravec, J.W. (2008). A new paradigm of knowledge production in higher education. *On the Horizon*, Vol. 16, Issue 3, pp. 123-136.
- 27. Rodríguez-Modroño, P. (2022). Working conditions and work engagement by gender and digital work intensity. *Information*, Vol. 13, p. 277. doi:10.3390/info13060277.
- 28. Tims, M. & Bakker, A. B. (2010). Job crafting: towards a new model of individual job redesign. *South African Journal of Industrial Psychology*, Vol. 36, pp. 1-9.
- 29. Tims, M., Bakker, A. B., & Derks, D. (2012). Development and validation of the job crafting scale. *Journal of Vocational Behavior*, Vol. 80, pp. 173-186. DOI: 10.1016/j.jvb.2011.05.009.
- Tims, M., Bakker, A. B., & Derks, D. (2013). The impact of job crafting on job demands, job resources, and well-being. *Journal of Occupational Health Psychology*, Vol. 18, pp. 230-240. http://dx.doi.org/10.1037/a0032141.
- 31. Van Eck, N. J. & Waltman, L. (2010). Software survey: VOSviewer, a computer program for bibliometric mapping. *Scientometrics*, Vol. 84, Issue 2, pp. 523-538. DOI 10.1007/s11192-009-0146-3.
- 32. Van Eck, N. J. & Waltman, L. (2011). Text mining and visualization using VOSviewer. *ISSI Newsletter*, Vol. 7, Issue 3, pp. 50-54.
- 33. Van Eck, N. J. & Waltman, L. (2020). VOSviewer 1.6.16 Manual. Universiteit Leiden.
- 34. Van Eck, N. J. & Waltman, L. (2021). VOSviewer 1.6.17 Manual. Universiteit Leiden.
- 35. Verzani, J. (2011). Getting started with RStudio: an integrated development environment for R. Sebastopol, CA USA.
- 36. Wrzesniewski, A. & Dutton, J. E. (2001). Crafting a job: revisioning employees as active crafters of their work. *Academy of Management Review*, Vol. 26, pp. 179-201. DOI: 10.2307/259118.
- 37. Wrzesniewski, A., LoBuglio, N., Dutton, J. E. & Berg, J. M. (2013). Job crafting and cultivating positive meaning and identity in work. In: Bakker, A.B. (Eds.), *Advances in positive organizational psychology* (pp. 281-302). West Yorkshrie, UK: Emerald Group.