

Title	A systematic literature review on flexible working and its influence on employees' well-being.
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Abstract

The current study presents a systematic literature review on flexible working and its influence on employees' well-being. The workplace model has undergone significant changes in recent years, with a shift from a central workplace setting to a more fragmented and dispersed model. This model, originally proposed by Jack Nilles, involves granting employees the flexibility to work away from the central office and engage with colleagues through telecommunication. While this practice has received recognition, it has also been criticized by scholars and practitioners alike. Flexible working is known to result in isolation, depression, loneliness, anxiety, and disengagement from social connections, among other reasons; however, there are instances where it is seen to show positive effects such as improvement in work engagement, reduction in stress, improvement in work-life balance, etc. One inference is that there are various factors which are responsible to influence the relationship between flexible working and well-being. To address this point, two research questions were framed: 1) what is the relationship between flexible working and well-being? 2) what are the factors that influence the relationship between flexible working and well-being? To answer these questions, a systematic literature review was conducted to develop a deeper understanding of the topic.

This paper presents the preliminary results from 525 articles identified from Scopus database and discusses these results through bibliometric analysis. This analysis helps to establish a deeper understanding of the subject. Some of the key findings show a significant rise in publication count between 2020 – 2022. The top contributions in terms of publication count were made by US (100), UK (46), Germany (45), Italy (41), and Australia (37). Moreover, a strong focus on flexible working forms, along with its influence on job satisfaction, productivity, work-life balance, and working conditions are discussed in the literature, and the resultant influence on employee well-being is established.

Overall, this paper contributes to the growing body of literature on flexible working and employee well-being and highlights the need for further research in this area to address the challenges posed by the current workplace model.

Keywords

Systematic literature review, flexible working, well-being, project professional.

Introduction

Workplace practices have changed in the last few decades. Much of this is associated with the technological advancement, globalisation, and digitalisation which has made a significant change to working life (Lunde et al., 2022). In the 1970s, one of the forms of flexible working called 'telecommuting' was introduced, arguably first coined by Jack Nilles (Allen et al., 2015), defined as "the practice of working from home, making use of the internet, email and the telephone" (Higgins et al., 2014, p. 70). Earlier scholars (Cascio, 1999; Olson, 1982; Pratt,

1984; Toffler, 1980) anticipated a significant workplace shift which eventually led to break away from the conventional office working style.

Recent literature on flexible working has used different variants to explain the working model, e.g., working from home (Avgoustaki & Bessa, 2019), telework (Lopes et al., 2023), NWW (new ways of working) (Andrulli & Gerards, 2023), telecommute (Golden, 2006), remote work (Fan & Moen, 2023), and its influence on well-being have shown to have mixed findings. Researchers have argued that greater flexibility results in greater work-life balance, and autonomy on the job resulting in increased well-being (ter Hoeven & van Zoonen, 2015), while others have debated that remote working results in being unfavourable (Kelliher & Anderson, 2010). Chesley (2010) explains that electronic communication during out-of-office hours result in stress, while it also depletes the work-life boundaries (Tietze & Musson, 2005) thus resulting in lower levels of well-being. For the purpose of this review, we will interchangeably use the term flexible working to refer to flexible working models touched upon earlier which are assisted by technology.

The subject of flexibility and well-being has received great attention by scholars, previous systematic literature reviews have been undertaken in the areas of flexibility (Bal & Izak, 2021); telework (Beckel & Fisher, 2022); virtual teams (Caputo et al., 2022); remote e-work (Charalampous et al., 2019); and working from home (Chirico et al., 2021) to name a few. While some others have connected it to the concept of well-being as well (Crawford, 2022; Ferrara et al., 2022; Furuya et al., 2022; Lunde et al., 2022; Shirmohammadi et al., 2022; Vleeshouwers et al., 2022). Moreover, the study by Shirmohammadi et al. (2022) showed an association between flexible working practices and different stress factors which cause a negative impact to work-life-balance (Vleeshouwers et al., 2022) eventually leading to lower levels of well-being (Furuya et al., 2022; Lunde et al., 2022).

Existing studies mentioned above were comprehensive in their given context and contributes to building the literature on flexible working and well-being. The current systematic literature review is unique in its own perspective. The keywords selected for the current study was based on careful consideration, and a wide range of variation were included to capture the broad spectrum of flexible working and well-being. Moreover, the focus of the current study is specifically related to identifying the key factors responsible for influencing the relationship between flexible working and well-being. The study is guided by the two research questions: 1) what is the relationship between flexible working and well-being? 2) what factors influence the relationship between flexible working and well-being?

Method

This paper uses a systematic literature review method. This approach is helpful in identifying gaps, especially, when the existing knowledge is fragmented across the disciplines (Denyer et al., 2008). To achieve the purpose of conducting the review in a rigorous and methodological manner, the study used PRISMA reporting method developed by (Moher et al., 2009). This will be useful to select a comprehensive dataset for analysis.

Selection criteria

In this study, we included articles based on the inclusion and exclusion criteria set forth in Table 1.

Inclusion criteria	Exclusion criteria
- Focussed on flexible working and well-being. - Focussed on technology-enabled flexible working forms.	- All non-empirical papers - Population: students, nurses on schedule shifts, and self-employed individuals are not made part of this study.

Table 1 Inclusion and Exclusion Criteria

Search strategy

A range of relevant variations of flexible working and well-being were selected (See Table 2). The selection of keywords and databases was based on a scoping exercise performed as part of this SLR to ensure full spectrum of different variants were covered for both key variables. At present Scopus was used as a starting point since it was highly cited in the existing literature reviews. As the current study progresses, more databases will be added as per our findings from the scoping exercise.

Flexible working	Well-being
"telework*" OR "home-based work*" OR "home based work*" OR "telecommut*" OR "remote work*" OR "flexible work*" OR "smart work*" OR "virtual work*" OR "agile work*" OR "mobile work*" OR "working from home" OR "hybrid work*")	("wellbeing" OR "well-being" OR "happiness" OR "quality of life" OR "life satisfaction" OR "affective well-being" OR "affective wellbeing" OR "burnout" OR "employee well-being" OR "employee wellbeing" OR "job stress" OR "work engagement" OR "job satisfaction" OR "psychological wellbeing" OR "psychological well-being" OR "subjective well-being" OR "subjective wellbeing" OR "hedonic" OR "Eudemonic" OR "eudaemonic" OR "hedon*" OR "Eudemo*" OR "eudaemo*")

Table 2 Keywords Selection

Data extraction

An extraction sheet is developed for guidance and consistency purpose which will be used for screening and extracting the articles for relevant information.

Study selection

The current study chose the PRISMA reporting method to study the article selection process. Figure 1, provides the total count identified for the study. As mentioned earlier, the current submission is of a development paper, therefore more articles/studies will be included as the current study progresses. At present, 2,048 articles were identified using the keyword search strings (see Table 2) in Scopus database identified for the study. As Scopus is the only database selected at present, therefore no duplicates were observed as per process. 1,523 articles were removed during the first stage of screening the title and abstract section based on the inclusion/exclusion criteria (see Table 1). The interim count of full papers identified thus far is 525.

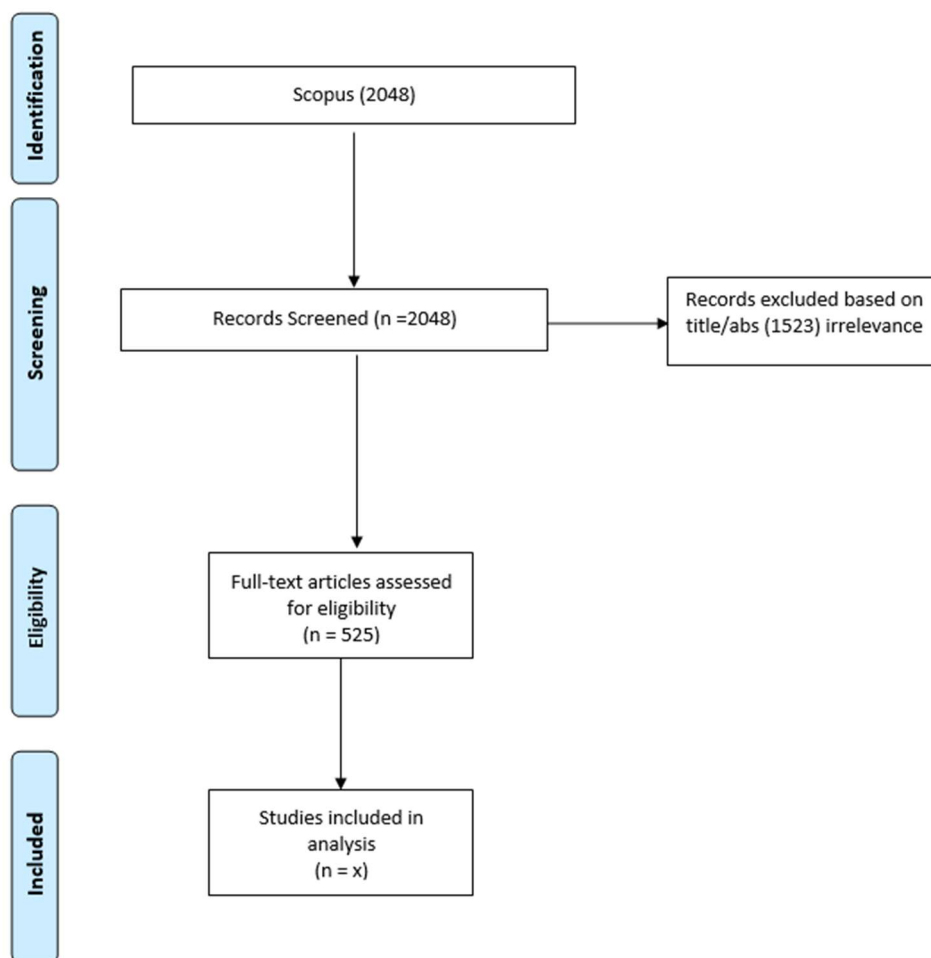


Figure 1 PRISMA Diagram (work-in-progress)

Results and Discussion

Bibliometric analysis

The current study is still in its development phase, hence, only a rudimentary analysis is performed with limited narration. For the purpose of this activity, Scopus database was selected as the primary source; however, as this developmental paper progresses, more databases will be added to ensure a comprehensive inclusion of articles.

Following section uses bibliometric analysis to obtain publication trend, geographical distribution of publications, and co-occurrence of keywords analysis. Two primary tools are selected for this activity VOSviewer, and Excel graphs.

Publication Trend **Error! Reference source not found.** represents the full count of 2,048 articles published during the period of 1973 and 2022. The data trend shows that from 1973 until 2006 less than 10 articles on average were published every year. The numbers reached a double-digit in early 2000s. The trend saw a sharp rise in 2020 (197) followed by an exponential rise in the years 2021 (454) and 2022 (695) studies.

Considering the above findings, one can argue that sharp rise in publication count in 2020 onwards could be attributed to the rise of Covid and how the practice of flexible working

became widespread, and well-being was being studied across board in every sector. Literature supports the latter inference (Andrulli & Gerards, 2023).

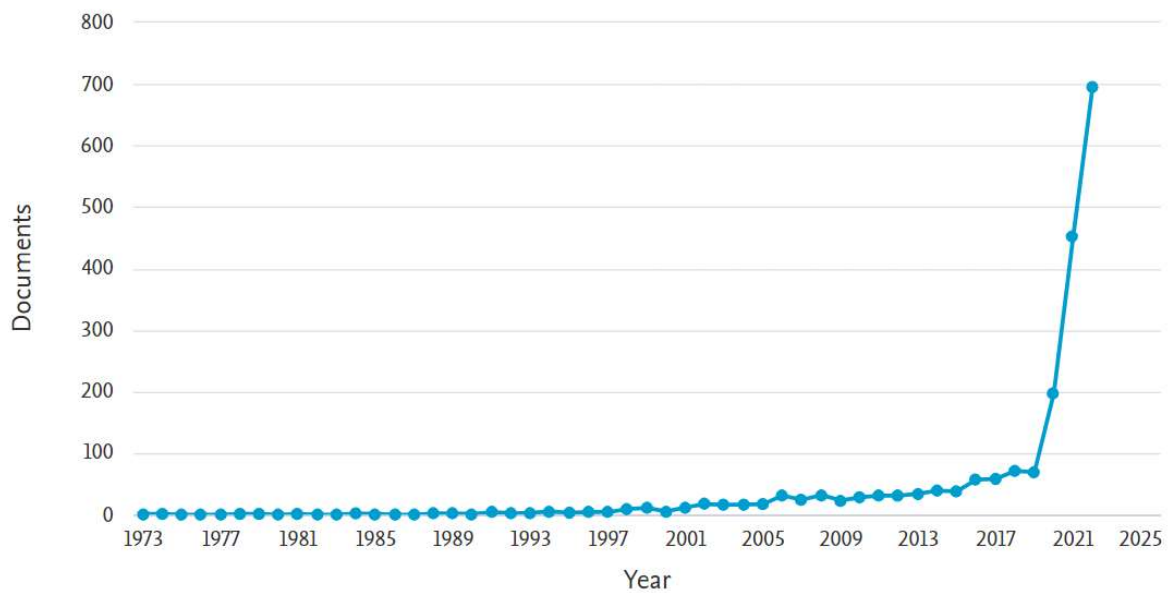


Figure 2 Publication Trend

Country specific analysis

Figure 3 shows the geographical distribution of publication on the topic of flexible working and well-being. The minimum range observed was five and the maximum number of articles published by a certain country was 100. One can argue that the western countries are leading the research on the subject of flexible working and well-being and the predominant players are USA, UK, Germany, Italy, and Australia with 100, 46, 45, 41, and 37 respectively. Some scholars claim that the practice of flexible working is more prevalent in the west, hence it make a logical reason for more studies focussed in those regions (Chandra, 2012; Galea et al., 2014).

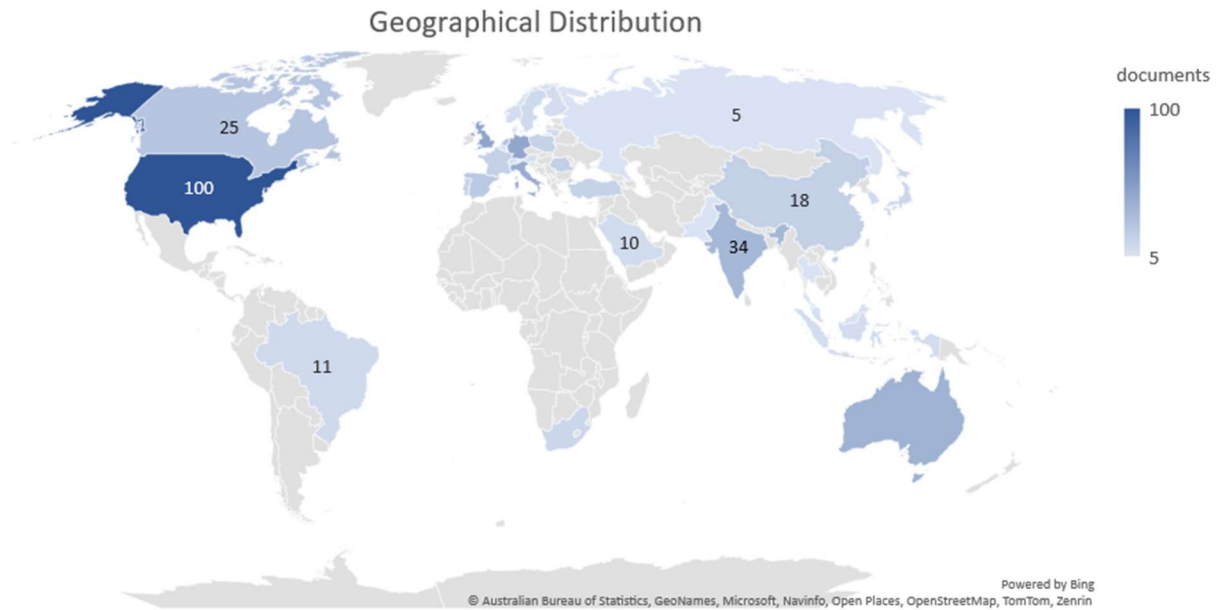


Figure 3 Publication Distribution Country Wise

Co-occurrence of keywords

Figure 4 represents the authors' keywords for the published articles. The selected articles can be divided into three clusters.

Cluster one: This cluster includes employee, job satisfaction, productivity, remote work, telecommuting, well-being, work engagement, work environment, work from home, work life balance, and working conditions. This cluster contributes to employees' productivity and jobs satisfaction while resources work remotely/ by telecommuting. The work environment is seen to have an influence on working conditions and work life balance resulting an influence on well-being.

Cluster two: This cluster includes burnout, female, job stress, male, psychology, survey and questionnaire, workplace. This cluster contributes to survey and questionnaire method for data collection where male and female participants took part in the study design.

Cluster three: This cluster includes cross-sectional study, mental health, quality of life and stress. This cluster largely focussed on cross-sectional studies where mental health and quality of life was assessed to understand the employee stress.

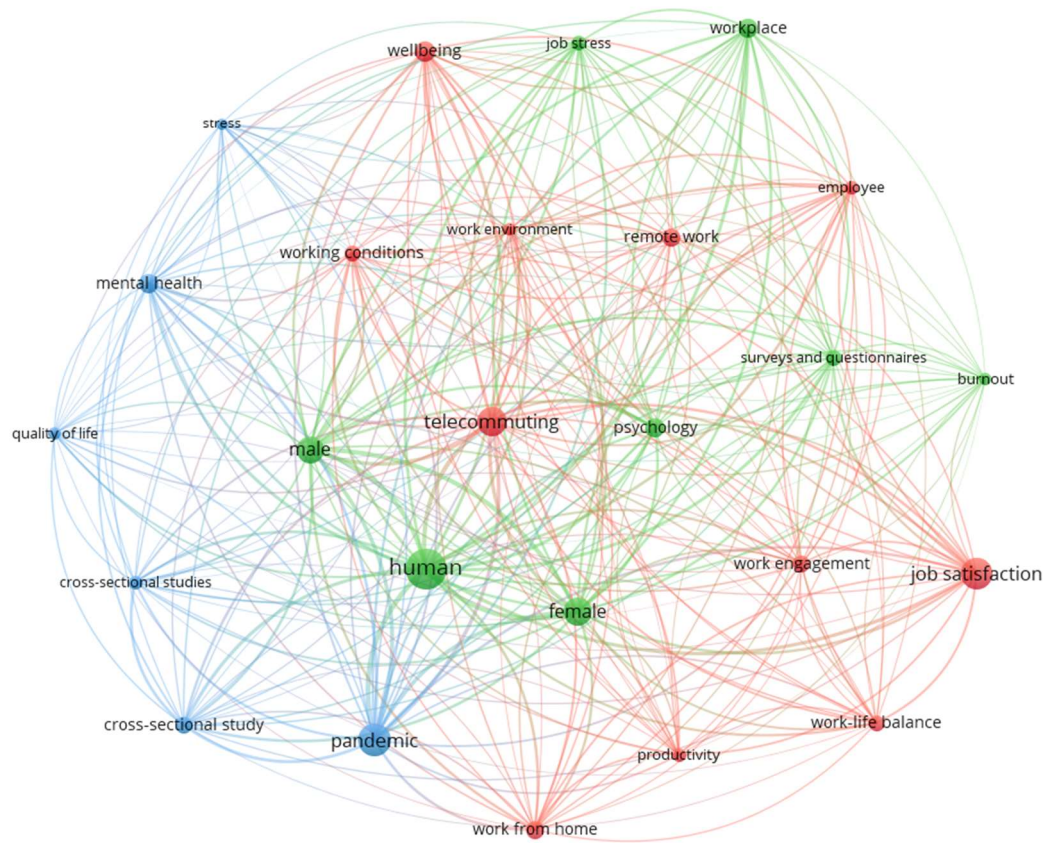


Figure 4 Co-occurrence of Keywords

Journal Publication

Figure 5 shows the top five journals in this category. The leading journal with most publication is International Journal of Environmental Research with 50 articles, followed by Frontier of Psychology (24), Sustainability (21), Work (13), and Journal of Occupational and Environmental Medicine (12).

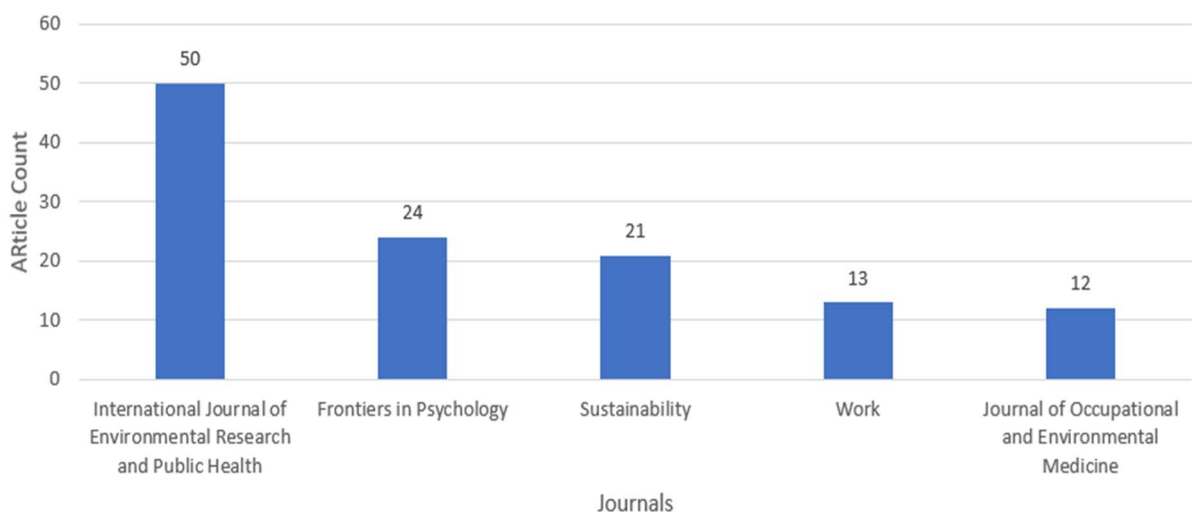


Figure 5 Journal Publication

Overall, in this study, the aim was to examine the relationship between flexible working and well-being, and understand what factors influence this relationship. In total 525 articles were screened for interim review since this is a development paper and more work and time is required to build on this study. It was decided that since full analysis was not feasible at this stage; an attempt be made to touch upon briefly on the body of knowledge on flexible working and well-being to show how this field is important and being extensively studied; especially after the Covid-19 pandemic.

The bibliometric analysis helped to see how the body of knowledge has sharply increased in recent years (Blahopoulou et al., 2022). It is predicted by scholars that the field will continue to rise since the practice of flexible working will continue as well (Ginès i Fabrellas, 2022) post Covid. Therefore, it becomes critical to study this topic in more detail.

Additionally, the largest contribution to the field is by social sciences, business management, and Engineering fields. Also, a significant portion of literature seems to have focussed on covid, mental health, job satisfaction, telework, and well-being. The proceeding trend is evident on mental health, stress, and work engagements. The VOSviewer helps to build an argument that the trend in the articles of current period have started to focus on mental health, well-being, burnout, telework and slight shift away from job satisfaction.

Limitation and future work

As this is still a development paper, more work is required on this section, however, knowingly the current limitations are listed below:

- The selection of one database restricts a comprehensive examination and analysis.
- The number of articles identified for full paper review is 525 which is a challenging task and requires further refinement of the selection criteria.

Future research areas are listed as below:

- From the country specific trend analysis, we have learnt that most of the research is predominantly performed in western societies. It becomes a key area for future work to understand why non-western countries have not contributed to this area as much. As authors of this paper, we invite researchers who are open to collaborate with us in this area for future research.

Conclusion

The growing trend of flexible working continues to put pressure on employees' well-being. We have not yet responded to the main research questions for this study since this was a developmental paper. However, during the analysis we have opened some new avenues for research to explore factors of the lesser contribution of non-western countries in the field of flexible working and well-being.

In the progress to develop this study as a full-scale paper, we will have covered more databases with more refinement in our keyword terms to extract relevant studies for the purpose to analyse them against our research questions.

We invite readers of this paper to provide us feedback and suggestions for improvement and refinement of this study.

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