

# Well-Being in Individuals with Alzheimer's Disease: A Bibliometric Analysis

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## Abstract

This study maps the development of research on well-being in individuals with Alzheimer's disease through a bibliometric analysis. As a neurodegenerative disorder, Alzheimer's not only affects cognitive functions but also the quality of life of patients and their caregivers. Data were retrieved from the Scopus database for the period 2000–2024, yielding a total of 1,636 documents, of which 316 articles were selected for analysis using bibliometric software. The findings indicate a growing trend of publications, with a peak in 2021, and highlight key themes such as social support, mental health, and psychological stress. Author and institutional analysis identified Linda Clare and Catherine Quinn as major contributors, while collaboration patterns remain concentrated in Europe and North America. The limited involvement of researchers from Southeast Asia, including Indonesia, suggests that the literature does not yet fully capture diverse cultural perspectives. This study provides a comprehensive overview of the research trajectory on well-being in Alzheimer's disease while underscoring geographical disparities. Practically, the findings may serve as a foundation for developing culturally contextualized family- and community-based interventions, as well as informing health and psychology practitioners in designing multidisciplinary approaches to improve the quality of life of Alzheimer's patients and their caregivers.

**Keywords:** bibliometric; alzheimer; well-being.

## Abstrak

Penelitian ini memetakan perkembangan riset mengenai well-being pada penderita Alzheimer melalui analisis bibliometrik. Alzheimer sebagai penyakit neurodegeneratif berdampak tidak hanya pada fungsi kognitif, tetapi juga pada kualitas hidup pasien serta pengasuh. Data diperoleh dari basis Scopus periode 2000–2024 dengan total 1.636 dokumen, yang setelah seleksi menghasilkan 316 artikel untuk dianalisis menggunakan perangkat lunak bibliometrik. Hasil menunjukkan peningkatan tren publikasi dengan puncak pada 2021, disertai fokus tema pada dukungan sosial, kesehatan mental, dan stres psikologis. Analisis penulis dan institusi mengidentifikasi Linda Clare dan Catherine Quinn sebagai kontributor utama, sedangkan pola kolaborasi masih terpusat di Eropa dan Amerika Utara. Keterlibatan peneliti dari Asia Tenggara, termasuk Indonesia, masih terbatas sehingga literatur belum sepenuhnya merepresentasikan keragaman perspektif budaya. Temuan ini memberikan gambaran komprehensif mengenai arah riset well-being pada Alzheimer sekaligus menyoroti kesenjangan geografis. Secara praktis, hasil analisis dapat menjadi dasar pengembangan intervensi berbasis keluarga dan komunitas yang kontekstual, serta bermanfaat bagi praktisi kesehatan dan psikologi dalam merancang pendekatan multidisiplin untuk meningkatkan kualitas hidup penderita Alzheimer dan pengasuh mereka.

**Kata kunci :** bibliometrik; alzheimer; well-being.

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## Introduction

Approximately 50 million people worldwide are living with dementia, and this number is projected to triple over the next three decades, with Alzheimer's disease accounting for approximately 60–70% of all cases (World Health Organization, cited in Petti, Baker, & Korhonen, 2020). In Indonesia, the number of individuals with Alzheimer's disease was estimated to reach one million in 2013. This figure is expected to double by 2030 and potentially increase to four million by 2050. The prevalence of Alzheimer's disease in Indonesia shows a consistent upward trend each year (Ministry of Health of the Republic of Indonesia, 2016). Alzheimer's disease is a chronic neurodegenerative disorder that leads to impairments in memory, language, problem-solving abilities, and other cognitive skills, including executive functioning (Alzheimer's Association, 2015). The growing number of cases is closely associated with various risk factors that contribute to the development of the disease.

Alzheimer's disease is a complex neurodegenerative disorder with multiple risk factors, broadly categorized into modifiable and non-modifiable factors. Non-modifiable factors include age, as the risk increases with advancing age, and sex, with women having a higher likelihood of developing the disease than men (Bendlin et al., 2010; Podcasy & Epperson, 2016; Guerreiro & José, 2015). Genetic factors also play a crucial role, particularly the presence of the apolipoprotein E (APOE)  $\epsilon$ 4 allele, which regulates lipid transport in the blood and may accelerate the accumulation of beta-amyloid plaques in the brain, thereby increasing vulnerability to Alzheimer's disease. A family history of Alzheimer's disease, such as having affected parents or siblings, further elevates the risk (Donix, Small, & Bookheimer, 2012; Govindugari et al., 2023).

The impact of these risk factors is reflected in cognitive functional decline, which hampers patients' ability to perform daily activities and often disrupts motivation, emotional regulation, and social behavior. As the disease progresses, patients become increasingly dependent on family members or caregivers, which may adversely affect the physical health of both parties and ultimately diminish quality of life and overall well-being (Alzheimer's Association, 2015).

In addition to cognitive decline affecting well-being, individuals with Alzheimer's disease also face significant psychosocial challenges. Several studies have found that psychosocial factors such as depression, anxiety, and feelings of loneliness are highly prevalent among Alzheimer's patients (Maurik et al., 2020; Zahodne et al., 2020). These factors exert a substantial influence on overall well-being, underscoring the importance of understanding Alzheimer's disease beyond its medical aspects by incorporating social and emotional dimensions.

The physical, cognitive, and psychosocial conditions experienced by individuals with Alzheimer's disease highlight the importance of a holistic understanding of well-being. According to Jayawickreme, Forgeard, and Seligman (2012), well-being is a condition in which individuals are able to achieve one or more of five core elements: Positive Emotion, Engagement, Relationships, Meaning, and Accomplishment. Previous research has demonstrated the positive effects of well-being on physical health and professional performance among school staff (Kern et al., 2014), as well as academic success at the university level (Tansey et al., 2018).

Most existing research on well-being among individuals with Alzheimer's disease has focused primarily on physical health or cognitive decline, while relatively

few studies have explored well-being from a broader perspective, particularly through bibliometric analysis. Bibliometric methods are used to examine research trends, interdisciplinary influences, and collaboration networks among researchers (Zyoud et al., 2018). This represents a significant research gap that can be addressed through bibliometric-based studies to better understand the development of research on well-being in Alzheimer's disease across various disciplines. Moreover, research on well-being among individuals with Alzheimer's disease remains largely concentrated in Western countries, with limited exploration of cultural contexts in other regions. Bibliometric analysis can help highlight these disparities and identify underrepresented regions.

Bibliometric analysis is a crucial approach in psychology and well-being interventions for Alzheimer's disease, as it provides a comprehensive overview of the research landscape. This approach maps the evolution of research, identifies emerging trends, and evaluates the impact of psychological interventions aimed at improving the quality of life of individuals with Alzheimer's disease (Feng et al., 2022; Yin et al., 2022). Through such mapping, researchers can identify the most extensively studied areas and the direction of topic development relevant to Alzheimer's patients (Li, Su, & Cai, 2025; Zou et al., 2025; Tang et al., 2023).

Furthermore, bibliometric analysis enables the mapping of publications and citation patterns to identify the most influential studies, authors, and institutions in Alzheimer's research (Jun, Chengye, & Hui, 2024; Shi et al., 2020). It also highlights high-impact journals and frequently cited articles, allowing researchers to refer to the most relevant literature (Jun, Chengye, & Hui, 2024; Shi et al., 2020; Chen, Nie, & Kuang, 2025). In addition, bibliometric tools such as VOSviewer and CiteSpace facilitate the visualization of international collaboration networks among researchers and institutions (Zou et al., 2025; Tang et al., 2023; Chen, Nie, & Kuang, 2025), while encouraging interdisciplinary research across fields such as neurology, psychology, and gerontology to develop more comprehensive interventions for individuals with Alzheimer's disease (Zou et al., 2025; Chen, Nie, & Kuang, 2025; Xu et al., 2025).

Bibliometric analysis also plays an important role in identifying research gaps, such as the need for standardized methodologies and consistent evaluation indicators in psychological interventions for Alzheimer's patients (Yin et al., 2022; Castillo-González, López Sánchez, & González-Argote, 2024). These findings provide direction for future research, including the integration of technology and innovative therapeutic approaches focused on enhancing the well-being of individuals with Alzheimer's disease (Jun, Chengye, & Hui, 2024; Chen, Nie, & Kuang, 2025; Liu et al., 2022). Such insights can improve the design and implementation of evidence-based interventions that are targeted and effective for both patients and caregivers (Svedin et al., 2023; Farrand et al., 2016), while also informing policy development and funding allocation in the most promising research areas (Shi et al., 2020; Castillo-González, López Sánchez, & González-Argote, 2024). Thus, bibliometric analysis is essential for advancing psychological research and interventions by providing a comprehensive map of trends, gaps, and collaborative opportunities that ultimately support improvements in the well-being of individuals with Alzheimer's disease.

Despite the breadth of these findings, bibliometric mapping also reveals notable geographic disparities. To date, Alzheimer's research has been predominantly conducted in American and European populations. The United States,

for example, is consistently identified as a global leader in Alzheimer's research, with the highest number of publications and substantial contributions from institutions such as the University of California and the National Institutes of Health (NIH) (Wang et al., 2023; Zhang et al., 2025; Sun et al., 2024). In Europe, particularly Western Europe, research activity is also substantial. Countries such as Germany, the United Kingdom, and Italy are major contributors to clinical and sociodemographic research, comorbidities, and treatment studies related to Alzheimer's disease (Zhang et al., 2025; Sun et al., 2024; Klimova, Maresova, & Kuca, 2016; Hausner et al., 2010; Niu et al., 2017).

Based on these gaps, the present study aims to map the development of research publications on well-being among individuals with Alzheimer's disease by addressing the following research questions: (1) What are the publication and citation trends in well-being research on Alzheimer's disease from 2004 to 2024? (2) Which authors and institutions have made the greatest contributions to this field? (3) What are the patterns of collaboration among authors and countries in well-being research on Alzheimer's disease? (4) What keywords or research topics are most prominent, and how have they evolved over time? and (5) How have the focus and direction of well-being research on Alzheimer's disease changed between 2004 and 2024? This study is expected to provide recommendations for future research and encourage the development of studies in Asian countries, particularly Southeast Asia, given that research on well-being among individuals with Alzheimer's disease remains predominantly centered on American and European populations.

## **Research Method**

### **Research Design**

This study employed a bibliometric analysis design using a quantitative-descriptive approach. Bibliometric analysis was selected because it provides a comprehensive overview of research trends, author productivity, collaboration patterns among researchers and countries, and thematic focuses in publications related to well-being among individuals with Alzheimer's disease. This approach is also useful for identifying research gaps and potential directions for future studies.

### **Data Sources**

Data were obtained from the Scopus database, which was chosen due to its broad coverage of journals in health sciences, psychology, and social sciences, as well as the compatibility of its metadata with bibliometric analysis software such as VOSviewer. Nevertheless, the limitation of relying solely on Scopus is acknowledged, as it may introduce database bias. Therefore, future studies are recommended to triangulate data using other databases such as Web of Science (WoS) or PubMed.

### **Search Procedur**

The literature search was conducted using the keywords "well-being" OR "well being" AND "Alzheimer" OR "Alzheimer's disease." The initial search yielded 1,636 documents. To narrow the scope of the analysis, a two-stage screening process was applied.

The first stage involved automatic screening conducted directly through the Scopus database filtering features. At this stage, the publication period was limited to 2004–2024, the subject areas were restricted to Neuroscience, Psychology, and Social Sciences, the document type was limited to articles, the language was restricted to English, and only documents with final publication status were included. This initial screening resulted in 316 documents that met the predefined criteria.

The second stage involved manual screening through a careful review of titles, abstracts, and keywords to ensure that the selected documents were directly relevant to the issue of well-being among individuals with Alzheimer's disease. Articles that mentioned Alzheimer's disease without explicitly addressing well-being were excluded from the analysis. As a result, the remaining documents were considered representative of the research focus.

To ensure the reliability of the selection process, manual screening was conducted independently by two researchers. The screening results were then compared, and any discrepancies were resolved through discussion until consensus was reached. Inter-rater agreement was assessed using Cohen's Kappa, a statistical measure of inter-rater reliability for categorical data. The use of Cohen's Kappa enhanced methodological rigor and strengthened the validity of the document selection process (Vanbelle & Albert, 2008). The results indicated a value above 0.80, which can be classified as substantial agreement, confirming that the selection process was conducted consistently and in a methodologically sound manner.

### **Data Analysis**

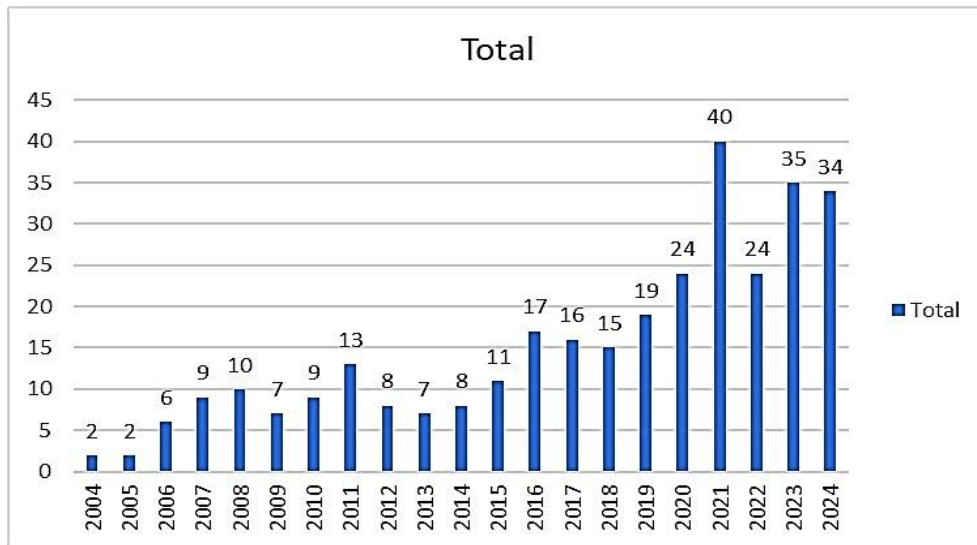
The selected data were exported in .csv format and analyzed using VOSviewer. This software enables the mapping and visualization of relationships among entities in bibliometric research, such as author collaboration (co-authorship), citation relationships among documents (co-citation), and keyword co-occurrence. Through visual mapping, researchers can observe collaboration patterns, identify the most influential researchers or institutions, and detect the most prominent research topics (van Eck & Waltman, 2010).

In addition to network mapping, the analysis also employed several basic bibliometric indicators commonly used in bibliometric studies. These indicators included the number of publications to assess research productivity, total citation counts as a measure of scientific impact, and the h-index, which combines productivity and citation influence for authors or articles. These indicators were selected because they provide a comprehensive assessment of both the quantity and quality of research output (Donthu et al., 2021).

Through this bibliometric approach, the findings are expected to offer a comprehensive overview of the development of research on well-being among individuals with Alzheimer's disease over the past two decades, including publication trends, collaboration networks, and the main thematic areas emerging in the literature

**Results**  
**Publication and Citation Trends**

Figure 2. Publication Trends



Based on Figure 2, the highest number of publications was recorded in 2021, with a total of 40 documents. This year marked a significant surge in publications related to well-being among individuals with Alzheimer's disease according to the Scopus database. In earlier years, such as 2004, only two publications were identified. The number of publications then increased gradually, reaching 24 documents in 2020. After peaking in 2021, the number of publications declined in 2022 to 24 documents, followed by a renewed increase in 2023 with 35 publications. In the most recent year, 2024, the total number of publications was recorded at 34 documents.

Table 1. Number of Citations per Year

Year	TAPI	TC	NCP	h	g
2024	34	69	14	3	7
2023	35	96	21	6	7
2022	24	162	22	7	11
2021	40	356	38	12	16
2020	24	347	22	10	18
2019	19	532	19	12	19
2018	15	464	15	13	15
2017	16	365	16	11	16
2016	17	561	17	13	17
2015	11	623	11	7	11
2014	8	301	8	7	8

Notes.  
TP=total

of

**Description:** publication; NCP = number of cited publications; TC = total citations; C/P = average citations per publication; C/CP = average citations per cited publication; h = h-index; g = g-index.

Furthermore, Table 1 shows that over a ten-year period, the highest Normalized Citation Impact (NCP), with a value of 38, was recorded in 2021. In terms of citation counts, publications from the same year also received the highest number of citations, totaling 365. Publications from 2019 made a particularly significant contribution to the development of the field, as indicated by an h-index of 12 and a g-index of 19, which were the highest values compared to other years. Meanwhile, in terms of publication output, 2015 recorded the highest number with a total of 11 documents, which cumulatively generated 623 citations.

Table 2. Most Cited Publications in 2021

Author	Title	Journal name	Number of Citations
Tam, Mallorie T., Dosso, Jill A., and Robillard, Julie M.	<i>The Impact of a Global Pandemic on People Living with Dementia and Their Care Partners: Analysis of 417 Lived Experience Reports</i>	<i>Journal of Alzheimer's Disease</i> . 2021: 865 – 875.	39
Á. Teahan, A. Lafferty, J. Cullinan, G. Fealy, E. O'Shea.	<i>An analysis of carer burden among family carers of people with and without dementia in Ireland</i>	<i>International Psychogeriatrics</i> . 2021;33(4):347-358.	27
J.M. Wiener, F. Pazzaglia	<i>Ageing- and dementia-friendly design: theory and evidence from cognitive psychology, neuropsychology and environmental psychology can contribute to design guidelines that minimise spatial disorientation</i>	<i>Cogn Process</i> 22, 715–730 (2021)	22
F. Epps, V. Heidbreder, K. Alexander, A. Tomlinson, V. Freeman, N. Williams	<i>A dementia-friendly church: How can the African American church support families affected by dementia?</i>	<i>Dementia</i> . 2021;20(2):556-569	19

Based on Table 2, the most highly cited study was the article by Tam, Dosso, and Robillard (2021), which received 39 citations. This article examined the experiences and needs of individuals living with dementia and their care partners during the COVID-19 pandemic, within the context of evaluating dementia support services in British Columbia. Other highly cited publications included the study by Teahan et al. (2021), which focused on caregiver burden among families of individuals with dementia, and the work by Wiener and Pazzaglia (2021), which emphasized dementia-friendly environmental design.

### Most Influential Authors

To address the research question concerning the most prominent and influential authors in the field of well-being research among individuals with Alzheimer's disease, the analysis focused on authors with the highest number of

publications as well as those who have consistently conducted research on Alzheimer's disease over time. Table 3 presents seven authors with the highest publication output who have significantly contributed to advancing the understanding of well-being research in individuals with Alzheimer's disease.

Table 3. Authors Consistently Publishing on Well-Being Research in Individuals with Alzheimer's Disease

Author	Published Documents	Total Citations
Linda Clare	11	222
Catherine Quinn	7	133
Joseph E. Gaugler	6	128
Anthony Martyr	6	110
Fiona E. Matthews	6	110
James E. Galvin	5	78
Laura D. Gamble	5	24

Influential authors are characterized by both publication productivity and citation impact. Based on Table 3, Linda Clare emerges as the most influential author with a total of 11 published documents, which have been cited 222 times. Although some of her most highly cited work falls outside the 2004–2024 time range, her seminal study published in 1999, Errorless learning of face–name associations in early Alzheimer's disease, remains one of the most frequently cited contributions. This study provides clear insights into research focus, outcomes, and contributions in the field of learning and intervention strategies for individuals with Alzheimer's disease. Another highly influential author is Catherine Quinn, who has published seven documents with a total of 133 citations. Other authors who have also demonstrated substantial influence in this field include Anthony Martyr, Fiona E. Matthews, James E. Galvin, and Laura D. Gamble.

### International Collaboration

Figure 4. International Collaboration Networks

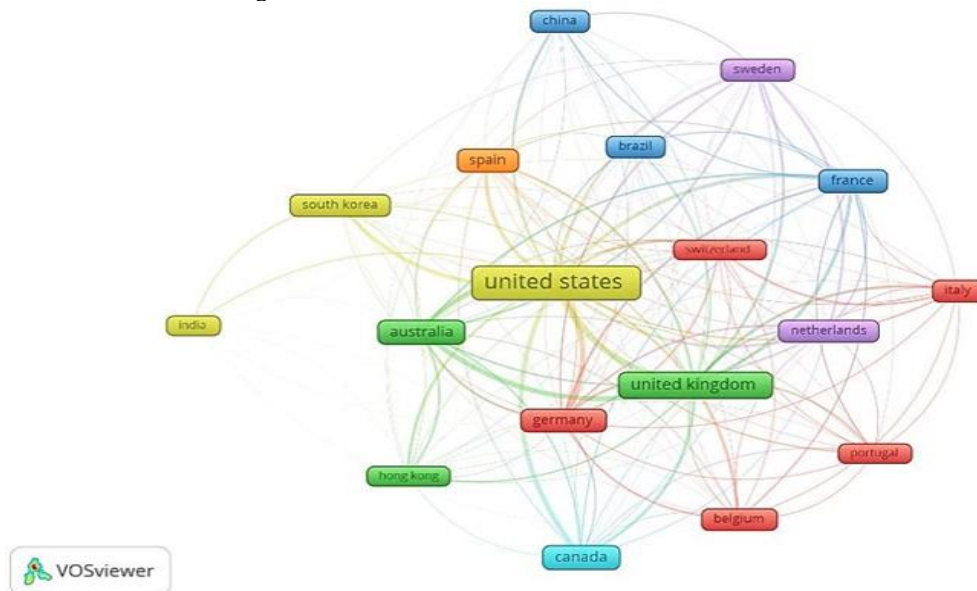


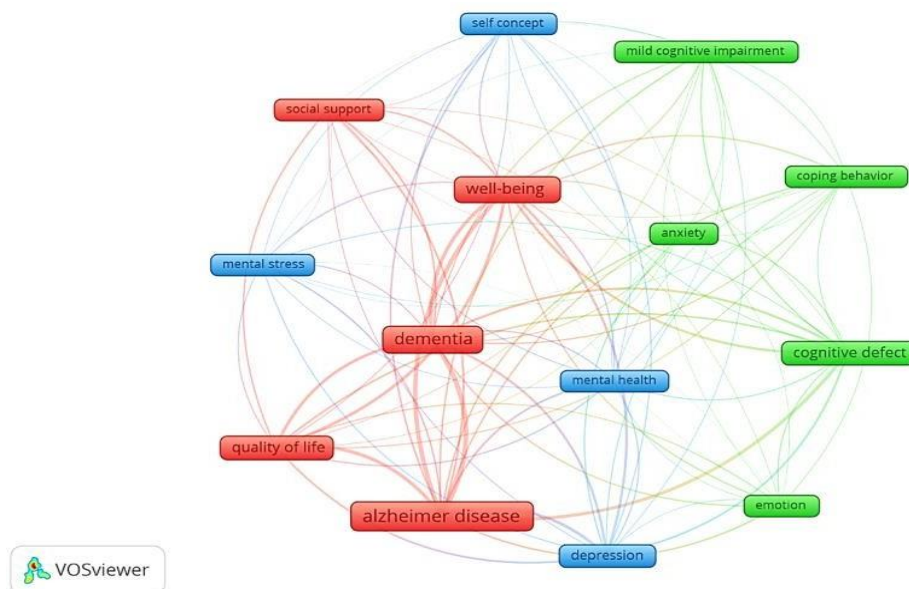
Figure 4 illustrates research collaboration among 18 countries in studies on well-being among individuals with Alzheimer's disease. Overall, seven collaboration clusters can be identified. The first cluster comprises five countries: Germany, Belgium, Portugal, Italy, and Switzerland. The second cluster includes the United

Kingdom, Australia, and Hong Kong. The third cluster consists of Brazil, France, and China, which demonstrate mutual collaboration. The fourth cluster includes three countries: the United States, South Korea, and India. The sixth cluster consists of the Netherlands and Sweden. Meanwhile, clusters seven and eight each include a single country, namely Canada (cluster seven) and Spain (cluster eight).

Most of the countries analyzed have collaborated with up to 17 other countries. India shows the lowest level of international collaboration, partnering with only eight countries. The United States recorded the highest number of collaborative publications, with 150 documents, followed by the United Kingdom with 47 documents. The lowest numbers of internationally collaborative publications were observed in India and Portugal, each with five documents. These findings suggest that international research collaboration on well-being among individuals with Alzheimer's disease remains limited in Southeast Asian countries and requires further development.

## Research Focus

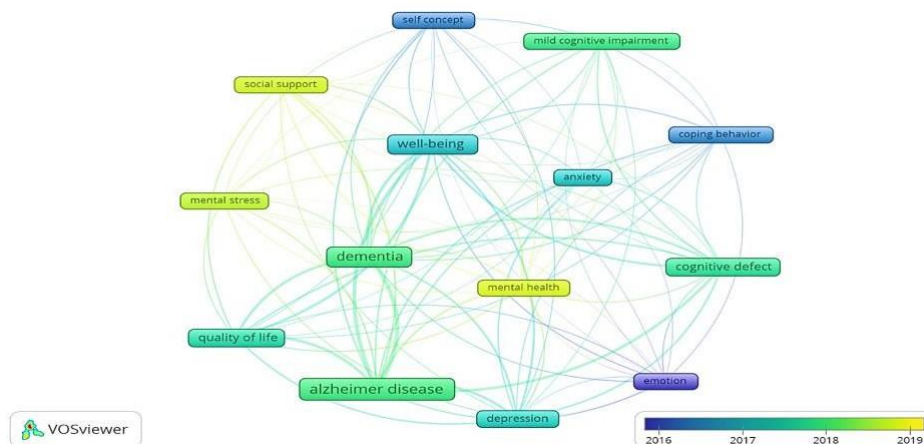
Figure 5. Keyword Relationships



Based on Figure 5, fourteen keywords form three main clusters in research on well-being among individuals with Alzheimer's disease. The first cluster consists of five keywords: *Alzheimer's disease*, *dementia*, *well-being*, *social support*, and *quality of life*. The second cluster includes five keywords: *anxiety*, *cognitive defect*, *emotion*, *mild cognitive impairment*, and *coping behavior*, with *coping behavior* (total link strength = 106) and *anxiety* (total link strength = 87) emerging as the dominant keywords. The third cluster comprises *depression*, *mental health*, *mental stress*, and *self-concept*, with *depression* identified as the primary keyword, showing the highest total link strength of 269. These findings indicate a research tendency that emphasizes social support, coping mechanisms, and mental health aspects among individuals with Alzheimer's disease.

## Trends in Research Focus

Figure 6. Keyword Usage Trends



Based on the overlay visualization (see Figure 6), the findings reveal that the keyword self-concept has not yet shown strong connectivity with the construct of cognitive impairment. This suggests the presence of a conceptual gap that remains underexplored in the existing literature. Furthermore, Figure 6 illustrates the emergence of relatively new research topics, indicated by brighter color visualizations. In the context of studies on well-being among individuals with Alzheimer's disease, these emerging topics include social support, mental health, and mental stress. The interconnections among these keywords indicate evolving research directions that may serve as a basis for future research recommendations, particularly in strengthening the conceptual framework of well-being in populations affected by Alzheimer's disease.

## Discussion

### Publication and Citation Trends

The results of the analysis indicate that publications on well-being among individuals with Alzheimer's disease have shown a continuous increase over the period 2004–2024, with a sharp surge occurring in 2021. This trend aligns with global patterns in which research on mental health and quality of life has received increasing attention, particularly among vulnerable populations. The spike in 2021 was most likely influenced by the COVID-19 pandemic, which generated an urgent need to understand the psychological and social impacts on older adults and individuals living with dementia. This finding is consistent with studies by Tam et al. (2021) and Teahan et al. (2021), which highlighted how the pandemic intensified psychosocial burdens for both Alzheimer's patients and caregivers, thereby stimulating a rise in related publications.

Beyond the pandemic context, the growth in publication output also reflects increasing global awareness of the importance of non-pharmacological approaches in Alzheimer's care. Whereas earlier Alzheimer's research primarily focused on clinical aspects such as cognitive decline, diagnosis, and pharmacological treatment, recent research trends increasingly emphasize quality of life, mental health, and psychosocial well-being. High citation counts for certain articles indicate the presence of seminal works, particularly those addressing community-based interventions,

caregiver coping strategies, and non-pharmacological therapies (Teri, 2020; Monteiro et al., 2018; Tesky, Schall, & Pantel, 2023; Fazio et al., 2023). These findings reinforce the view that well-being is not merely a complementary aspect but a central dimension of Alzheimer's disease management.

The upward trend in publications should also be considered within the context of policy support and research funding. In the United States and Europe, governments and major funding agencies have increased investments in dementia research, extending beyond medical aspects to include psychosocial interventions. This situation has contributed to a higher volume of articles published in high-impact journals (Wang et al., 2023; Sun et al., 2024; Jun, Chengye, & Hui, 2024). In contrast, contributions from developing countries, including those in Southeast Asia, remain limited. Constraints related to research funding, infrastructure, and public awareness may explain the relatively low publication output from these regions (Leroi et al., 2020; Laurencio et al., 2023; Sy et al., 2020). Thus, despite the overall global growth in publications, significant geographic disparities persist.

From a citation perspective, the most frequently cited articles tend to be those that introduce innovative or systematic approaches to well-being among individuals with Alzheimer's disease. High citation counts suggest that these studies have influenced not only academic discourse but also policy development and clinical practice. For instance, the work of Clare et al. (2021) on illness representations and psychological adaptation in dementia has been widely cited as a foundational reference, demonstrating its role in broadening the conceptualization of well-being. Overall, publication and citation trends reveal a paradigm shift in Alzheimer's research. While earlier studies primarily emphasized cognitive aspects, there is now a growing focus on holistic well-being that integrates psychological, social, and emotional dimensions. This shift underscores that well-being research is not merely supplementary but an integral component of global strategies to address Alzheimer's disease. These findings also present opportunities for researchers, particularly in Southeast Asia, to expand their contributions through culturally contextualized studies that reflect local social and cultural conditions.

### **Most Influential Authors**

The bibliometric analysis identifies Linda Clare as the most influential author in research on well-being among individuals with Alzheimer's disease. Clare's dominance in both publication output and citation impact reflects the consistency of her research focus on psychological adaptation, psychosocial interventions, and efforts to improve the quality of life of individuals living with dementia. One of her most influential contributions is research on illness representation, which demonstrates how patients' understanding of their condition can shape their psychological adaptation to Alzheimer's disease (Clare et al., 2021). This work provides a strong theoretical foundation for understanding well-being not only from a clinical standpoint but also from the subjective experiences of patients.

In addition to Linda Clare, other influential authors often emerge from interdisciplinary collaborations involving clinical psychology, neurology, and social sciences. Their contributions highlight the multidimensional nature of Alzheimer's research and the necessity of diverse disciplinary perspectives. High productivity among these authors also indicates the presence of active research hubs, particularly in Western Europe and the United States. This pattern suggests that research on well-

being among individuals with Alzheimer's disease remains geographically concentrated, with limited participation from developing countries.

From a citation standpoint, the work of influential authors frequently serves as a reference for the development of non-pharmacological interventions, including cognitive therapies, caregiver support programs, and community-based approaches (Teri, 2020; Monteiro et al., 2018; Tesky, Schall, & Pantel, 2023; Fazio et al., 2023). These publications often become foundational sources for subsequent studies, creating a multiplier effect in the development of the literature. This dominance also indicates that, despite the expanding scope of well-being research, a relatively small number of key figures continue to shape its direction.

However, the dominance of certain authors has broader implications. On the one hand, it helps establish theoretical and methodological consistency (Peidu, 2019). On the other hand, it may limit perspectives if the field is shaped primarily by a small group of researchers (Bajwa & König, 2019). Therefore, contributions from authors across diverse countries and academic backgrounds are essential to enrich research perspectives. For instance, studies from regions such as Asia have the potential to offer new insights into how culture, family structures, and local policies influence the well-being of individuals with Alzheimer's disease.

In this regard, the prominence of Clare et al. (2021) and other leading authors highlights both the importance of sustained contributions from established scholars and the need for greater author diversity. Future cross-national and interdisciplinary collaborations are expected to broaden the scope of research, enrich theoretical perspectives, and enhance the relevance of interventions for more diverse populations. This aligns with the core objective of bibliometric analysis, which is not only to identify influential authors but also to map collaborative potential to address global Alzheimer's challenges.

### **Researcher Collaboration**

The analysis shows that researcher collaboration in the field of well-being among individuals with Alzheimer's disease forms four main clusters. Linda Clare occupies a central position in the first cluster with 25 collaborative links, followed by Anthony Martyr with 23 collaborations, Laura D. Gamble with 21 collaborations, and Roy W. Jones with 18 collaborations. This pattern indicates the presence of strong collaborative networks, particularly among researchers who consistently focus on Alzheimer's-related issues. It also suggests that research on well-being among individuals with Alzheimer's disease increasingly relies on multidisciplinary collaboration, given the complexity of the condition and the need to integrate expertise from neurology, psychology, and social sciences (Rodriguez, 2020; Lanzoni et al., 2018).

Collaboration among researchers also contributes to publication quality. Articles produced through cross-disciplinary collaboration tend to receive higher citation counts, as they often employ more diverse methodologies and offer more comprehensive analyses (Potter et al., 2020). For example, studies involving both clinical psychologists and neurologists allow for the integration of medical assessments and psychological evaluations (Noroozian, 2016; Shaughnessy & Weintraub, 2025). Consequently, these collaborative patterns not only enhance research productivity but also strengthen the validity of findings and enrich perspectives on well-being among individuals with Alzheimer's disease.

### **International Collaboration**

The analysis reveals that research on well-being among individuals with Alzheimer's disease is dominated by developed countries, particularly the United States and Western European nations such as the United Kingdom, Germany, and Italy. This dominance is consistent with previous bibliometric findings indicating that global Alzheimer's research centers remain concentrated in regions with substantial funding, strong research infrastructure, and proactive health policies. The significant contributions from these countries reflect a strong commitment to understanding not only the medical aspects of Alzheimer's disease but also its psychosocial and well-being dimensions.

International collaboration is crucial in this field, as Alzheimer's disease is a global issue that transcends cultural boundaries. Countries that successfully establish international research networks tend to produce more influential publications in both quantity and quality. Cross-national collaboration also facilitates the exchange of research methodologies, evaluation standards, and intervention strategies that can be adapted to diverse contexts. For example, collaborations between European and North American researchers have resulted in studies that integrate longitudinal data with psychosocial approaches, offering a more comprehensive understanding of the impact of Alzheimer's disease on patients' and families' quality of life.

Nevertheless, existing collaboration patterns reveal significant geographic imbalances. The participation of Asian countries, including Southeast Asia, remains relatively limited in research on well-being and Alzheimer's disease. This may be attributed to limited research funding, inadequate infrastructure, and low policy prioritization of dementia in many developing countries. This is particularly concerning given that the elderly population in Asia is projected to increase sharply in the coming decades, which will likely lead to a higher prevalence of Alzheimer's disease. Consequently, limited contributions from this region risk creating gaps in the global literature, particularly regarding cultural and social perspectives.

Furthermore, collaboration network analysis shows that most international collaborations remain regional, such as within Western Europe or between North America and Europe. Cross-continental collaborations involving Asia and Africa remain scarce. This pattern risks narrowing the global perspective on well-being among individuals with Alzheimer's disease, as social, cultural, and economic contexts outside the Western world are often underrepresented. These findings highlight the need to expand more inclusive international collaboration networks to better capture the diversity of experiences among individuals with Alzheimer's disease worldwide.

Overall, findings on international collaboration emphasize two key points. First, developed countries continue to serve as the primary centers of gravity for global Alzheimer's research. Second, significant representational gaps remain for developing countries, which may introduce bias into the literature. Addressing these issues requires efforts to promote more equitable international collaboration through global funding support, cross-continental research consortia, and institutional partnerships that actively involve Southeast Asian countries. Such efforts would not only enrich the global literature but also support the development of interventions that are more relevant to local community needs.

## Research Focus

Keyword analysis indicates that research on well-being among individuals with Alzheimer's disease is organized into three main clusters. The first cluster highlights social support and quality of life as central issues. These keywords frequently co-occur with Alzheimer's disease, dementia, and well-being, underscoring the importance of social support in maintaining patients' quality of life. This finding is consistent with Jayawickreme et al. (2012), who identified social support as a key determinant of well-being through the relationship dimension. Social support not only strengthens social interactions but also helps patients remain connected to their environment, thereby enhancing their quality of life.

The second cluster comprises five keywords, with coping behavior (total link strength = 106) and anxiety (total link strength = 87) emerging as the most dominant. This suggests that individuals with Alzheimer's disease frequently experience cognitive challenges that trigger anxiety, making coping strategies a crucial factor in maintaining well-being. Several studies have reported that difficulties such as forgetting familiar names can lead to frustration and social withdrawal, increasing the risk of anxiety (Gomes, Simón, & Lázaro, 2024; Erbay, 2022). Effective coping strategies particularly problem-focused approaches are essential for preserving well-being among both patients and caregivers, as they have been shown to reduce caregiver burden and improve psychological outcomes (Chen et al., 2015; Heidari, 2021).

The third cluster emphasizes keywords such as depression, mental health, mental stress, and self-concept, with depression emerging as the most prominent keyword (total link strength = 269). This indicates that depression is the most salient psychological issue in the Alzheimer's literature (Untu et al., 2025). Moretti et al. (2002) noted that targeted treatment of depressive symptoms can yield significant benefits, including reduced caregiver stress and improved patient well-being. However, research also highlights challenges in diagnosing depression among individuals with Alzheimer's disease due to symptom overlap.

Overall, the keyword patterns suggest that existing research continues to emphasize negative aspects such as depression, anxiety, and mental stress rather than protective factors. This highlights an opportunity for future studies to place greater emphasis on positive constructs such as resilience, self-concept, and family-based support, in order to achieve a more balanced and comprehensive understanding of well-being among individuals with Alzheimer's disease.

## Trends in Research Focus

Analysis of research focus trends over the past two decades (2004–2024) reveals a substantial shift in topics related to well-being among individuals with Alzheimer's disease. In the early period (2004–2010), research primarily focused on medical aspects and cognitive decline, with dominant keywords such as memory loss, cognitive impairment, and Alzheimer's disease progression. During this phase, well-being was often narrowly conceptualized as quality of life measured through cognitive and physical decline.

Between 2011 and 2016, there was a noticeable increase in publications incorporating psychosocial perspectives into discussions of well-being. Keywords such as caregiver burden, depression, and anxiety became more prominent, reflecting growing recognition that Alzheimer's disease affects not only brain function but also

the psychological well-being of patients and caregivers (Meléndez et al., 2018). Research during this phase frequently explored the relationship between patients' cognitive conditions and caregivers' mental health, framing well-being as a phenomenon involving both parties.

During the 2017–2020 period, well-being research in the context of Alzheimer's disease began to be influenced by positive psychology frameworks. Topics such as resilience, coping strategies, social support, and quality of life increasingly appeared as research keywords. This shift indicates that the literature began to move beyond a sole focus on the negative impacts of the disease to highlight protective factors that enhance psychological well-being for both patients and caregivers. In addition, studies during this period began to explore non-pharmacological interventions such as music therapy, art therapy, and group activities, although these approaches had not yet become mainstream.

The most recent trend (2021–2024) shows a significant rise in publications adopting multidisciplinary approaches to well-being. Emerging keywords such as digital health, virtual reality, neuroinflammation, and cross-cultural studies indicate growing efforts to integrate technology into well-being support for individuals with Alzheimer's disease, alongside increased awareness of cultural context in shaping patient experiences. For example, the use of virtual reality to enhance emotional engagement among individuals with Alzheimer's disease (Cotrim et al., 2025; Mandal, Morrison, & Bag, 2025) and cross-cultural studies emphasizing differences in well-being experiences (Aurooj & Mahmood, 2022) reflect this evolving focus.

In summary, trends in research focus demonstrate a clear shift from a narrow medical paradigm toward a more holistic, multidisciplinary, and contextual approach. Future research directions are likely to increasingly emphasize the integration of technology-based interventions, psychosocial support, and cultural factors in efforts to enhance the well-being of individuals with Alzheimer's disease. This shift is particularly important as it opens new opportunities for the development of evidence-based, innovative, and applicable interventions, both in Western countries and in Asian regions that remain underrepresented in the global literature.

## Conclusion

The results of the bibliometric analysis indicate that publications on well-being among individuals with Alzheimer's disease experienced a significant increase during the period 2004–2024, with the highest surge occurring in 2021, despite a temporary decline in 2022. Dominant research topics include social support, mental health, and psychological stress, reflecting a shift in focus from purely clinical aspects toward approaches that emphasize quality of life and psychosocial well-being.

Authors such as Linda Clare and Catherine Quinn emerged as key contributors with strong influence, as reflected by their high numbers of publications and citations. Research collaboration, particularly among scholars in Europe and North America, has been shown to enhance research quality and enrich multidisciplinary perspectives. However, the involvement of researchers from Southeast Asia remains limited, indicating that the existing literature does not yet fully capture local cultural contexts. Keyword analysis further reveals an evolution of research themes toward community-based interventions, caregiver support, and strategies aimed at improving patients' quality of life.

Overall, this study confirms that research on well-being among individuals with Alzheimer's disease is moving in a more holistic direction, encompassing not only clinical dimensions but also social and emotional aspects. These findings provide an important foundation for expanding research in underrepresented regions, particularly Southeast Asia, and for developing interventions that are more culturally and socially responsive.

### Recommendations

Based on the findings, several recommendations can be proposed. First, future researchers are encouraged to conduct more in-depth studies on family and community based social interventions, given the strong kinship values in Southeast Asia that may serve as unique sources of psychological support. Further research may also focus on the integration of technology, such as digital health programs or virtual reality based therapies, which have the potential to improve access to interventions in areas with limited healthcare services.

Second, for healthcare and psychology practitioners, the results underscore the importance of designing interventions that extend beyond clinical treatment to address the psychosocial well-being of both patients and caregivers. Practitioners may utilize insights on the significance of social support to develop family accompaniment programs, caregiver coping skills training, and community-based counseling services.

Third, for policymakers, it is essential to promote cross-national and interdisciplinary collaborative research, as well as to expand research funding that is relevant to the cultural contexts of Southeast Asia. In doing so, the literature on well-being among individuals with Alzheimer's disease can become not only globally relevant but also locally adaptive to societal needs.

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