

Mapping the Impact: A Comprehensive Review of Art-Based Interventions for Dementia (2000-2022)

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ABSTRACT: The global arts in healthcare movement affects patient care and hospital surroundings. This paper reviews and bibliometrically analyzes Impact Art-Based Intervention for Dementia Patients from 2000 to 2022. A total of 57 documents were created on October 16, 2022, using Rstudio 4.2.1 and biblioshiny for bibliometrix. These papers were used for doing an in-depth study to identify research patterns. In Scopus, Dementia is the most popular journal, and in Web of Science, Dementia-International Journal of Social Research and Practice. Scopus uses "Dementia" as the most common author keyword and add keyword, but Web of Science uses "Impact". Most popular writers include Camic, P. M. (Scopus), Charura, D., and Surr, C (WoS). UK scientific papers dominate Scopus and Web of Science. Scopus is most associated with Canterbury Christ Church University, whereas Web of Science is Leeds Beckett University.

Keywords: Art therapy, Art-based intervention, Dementia, Bibliometric analysis, Rstudio, Biblioshiny

1. Introduction

Brain disorders like dementia influence memory, thinking, behavior, and emotion. Alzheimer's affects 50–60% of dementia sufferers. Other dementias include vascular, Lewy body, Parkinson's, and frontotemporal young onset (Alzheimer's Disease International, 2022). The WHO expects 139 million people to have dementia by 2050 (Alzheimer's Disease International, 2022). No cure for dementia. Treatments and interventions have been examined extensively. Medication is the main therapy, notwithstanding its limitations (Gauthier, 2002). Licensed therapies for Alzheimer's and Parkinson's dementia may reduce cognitive decline by a year but not affect the disease's course (Raina et al., 2008). Antipsychotics treat 50% of patients' behavioral and psychological symptoms (BPSD). Antipsychotics increase geriatric cerebrovascular events and mortality (FDA, 2005; Schneider, Dagerman & Insel, 2005). Medication has more risks and adverse effects than non-pharmacological

dementia treatment (Livingston et al., 2005). BPSD should be treated nonpharmacological first (Workgroup, 2008; National Collaborating Centre for Mental Health (UK), 2007). Non-pharmacological therapies can delay hospitalization and reduce caregiver stress (Chien et al., 2011). They are also becoming more important in dementia care.

Patients and caregivers employ non-pharmacological therapy for dementia. Aerobic exercise and strength training, occupational therapies that involve ADL training and environmental adaptations, improve patients' daily function (McLaren, Lamantia & Callahan 2013; Rao et al., 2014). Cognitive training, stimulation, and rehabilitation have inconsistent evidence. (person or group). Art and music therapies lack evidence (Gauthier et al., 2010; Olazarán et al., 2010).

A bibliometric analysis review summarizes research on a subject with enough publications. This research reviews the literature and analyzes the impact of existing art-based therapies on dementia patients using RStudio and biblioshiny. Reviewing bibliometrics may help understand research trends. Academics and researchers may assess art-based dementia research globally using these statistics.

The article is four-part. We review dementia studies on art-based intervention after the introduction. Section 3 discusses the study's empirical reference sources and methods. Part 4 summarizes Part 5's core bibliometric analysis's main results. Each portion may include subheadings summarizing experimental results, interpretation, and possible conclusions.

2. Literature Review

2.1 Impact Art Therapy to dementia

Brain disorders like dementia influence memory, thinking, behavior, and emotion. Alzheimer's affects 50-60% of dementia sufferers (Alzheimer's Disease International, 2022). Dementia includes Alzheimer's, vascular, Lewy body, frontotemporal, and mixed dementia. Several illnesses induce dementia, which causes memory loss, thinking, perception, and communication problems (Swaffer & Low, 2016).

Art therapy (AT), a non-drug treatment, uses psychotherapy, Virago (2021), and creative production processes Gruber and Weis (2010), such as theatre, music, dance, and drawing, to improve health. Art therapy (AT) is a non-verbal intervention that may aid mental health issues in all ages (Toroghi, 2015; Raluca & Bocos, 2013).

AT, an expressive therapy, may improve communication and emotion. Stojkovic, et al. (2016) encouraged emotional release and delight. Kaimal, et al. (2019), improving patient behavior Duncan and Huebner (2018), and improving quality of life Boudebza et al. (2006), Ostroski, Bruscato, Moro and Tommasi (2011), and Thanasilp et al. (2018) and their self-confidence. The creative creation process of AT may express, examine, and experiment with different facts, attitudes, and emotions (Hanes, 2019). Art lets people express themselves (Attard & Larkin, 2016). AT improves mental and physical health, including dementia (Duncan & Huebner, 2018; Mak, Woo, Kou & Tse, 2009; Elliott & Older Adults Arts Therapies Service (OAATS) team, 2021).

Art therapy may be organized or unstructured, and the following sessions reflect this. Facilitators plan structured art therapy sessions' topics, resources, and structure. Structural sessions are best for severe dementia, mobility issues, etc. Instead of a facilitator, dementia patients lead unstructured sessions and choose their own materials, topics, and equipment. Art therapy is effective since it may meet individual needs. Hendriks et al. (2019) say it may be utilized to communicate with patients and meet their emotional and psychological needs. Schall et al. (2018), Graham and Fabricius (2018), Ramsey, Webb, and Ellis (2018), and others help recall.

Art-based therapy improve dementia patients' self-esteem, attention, and memory (Seifert, Spottke & Fliessbach, 2017). In 2007, MoMA in New York City launched the innovative "Meet Me at MoMA" project. First gallery to make art accessible to dementia patients and caregivers (Rosenberg, 2009). The effort aims to boost public engagement and quality of life via intellectual stimulation, shared experiences, and social relationships. It created a framework for delivering and creating art programs for dementia patients and their caregivers.

3. Methodology

The PRISMA criteria, which stand for Preferred Reporting Items for Systematic Reviews and Meta-Analyses, were followed throughout the bibliometric analysis review. It is usual practise to give an assessment of the quality and reliability of a review on the relevant and appropriate information provided by publishing guidelines. PRISMA recommends the following four methods for discovering and obtaining information for a bibliometric analysis review.

3.1 Data source and Search strategy (Identification)

To collect the necessary data for this analysis, a comprehensive search query was run using two online databases, namely Scopus and Web of Science. Even though the Web of Science (WoS) database is a popular option for bibliometric analysis among scholars, the Scopus database has a significant number of articles in the social sciences, particularly after 1996 (Thananusak, 2019; Zheng, C., & Kouwenberg, 2019).

Using the online databases Scopus and Web of Science, a comprehensive search was done on October 16, 2022. Searches were restricted to a single day to avoid bias from being initiated by the database's frequent updates. As part of the analysis, researchers focused on articles published between 2000 and 2022 in the Scopus and WoS databases about the impact art-based intervention for people living dementia. The following search technique provides an illustration searching in both databases using BOOLEAN operations (OR, AND) as seen in the following:

Topic: (("Effect" OR "Impact") AND ("art-based intervention" OR "art-intervention" OR "art-therapy") AND ("people with dementia" OR "people living dementia" OR "dementia patient" OR "dementia disease"))

Refined by: Document types in Scopus and Web of Science (there was no restriction on the type).

Criteria: "titles, abstract and keywords (topic area)."

Year Published: 2000-2022.

Language: English.

Table 1 : The search string

Database Search string	Search string strategy Boolean operators	No. Articles
Scopus	TITLE-ABS-KEY(((("Effect" OR "Impact") AND ("art-based intervention" OR "art-intervention" OR "art-therapy") AND ("people with dementia" OR "people living dementia" OR "dementia patient" OR "dementia disease")))) AND PUBYEAR > 1999 AND (LIMIT-TO (LANGUAGE,"English"))	47
Web of Science	TS= (("Impact" OR "effect") AND ("art-based intervention" OR "art intervention" OR "art therapy") AND ("people with dementia" OR "people living dementia" OR "dementia patient" OR "dementia disease")) 2022 or 2021 or 2020 or 2019 or 2018 or 2017 or 2016 or 2015 or 2014 or 2013 or 2012 or 2011 or 2010 or 2009 or 2008 or 2007 or 2006 or	10

	2005 or 2004 or 2003 or 2001 or 2000 (Publication Years) and English (Languages)	
Scopus & WoS	Total databases	57

To analyse all the essential data included in the publishing databases, namely Scopus and Web of Science. For data extraction, researchers carefully download data from each database. Web of Science was obtained in *Text Document format whereas Scopus was downloaded in *CSV format. This data consists of the title of the article, the name and affiliation of the authors, the abstract, the keywords, the name of the journals, the references, etc. The researcher analysed the gathered data using RStudio software version 4.2.1 and the biblioshiny web interface 4.0. After narrowing the database release, 47 articles were downloaded from Scopus, whereas only 10 were obtained from Web of Science. Utilizing the bibliometric tool known as biblioshiny, it can visualise and analyse patterns of the impact art-based intervention for people living dementia. The aim of the article is to examine the current situation throughout the nation from 2000 to 2022 and provide the findings about those trends.

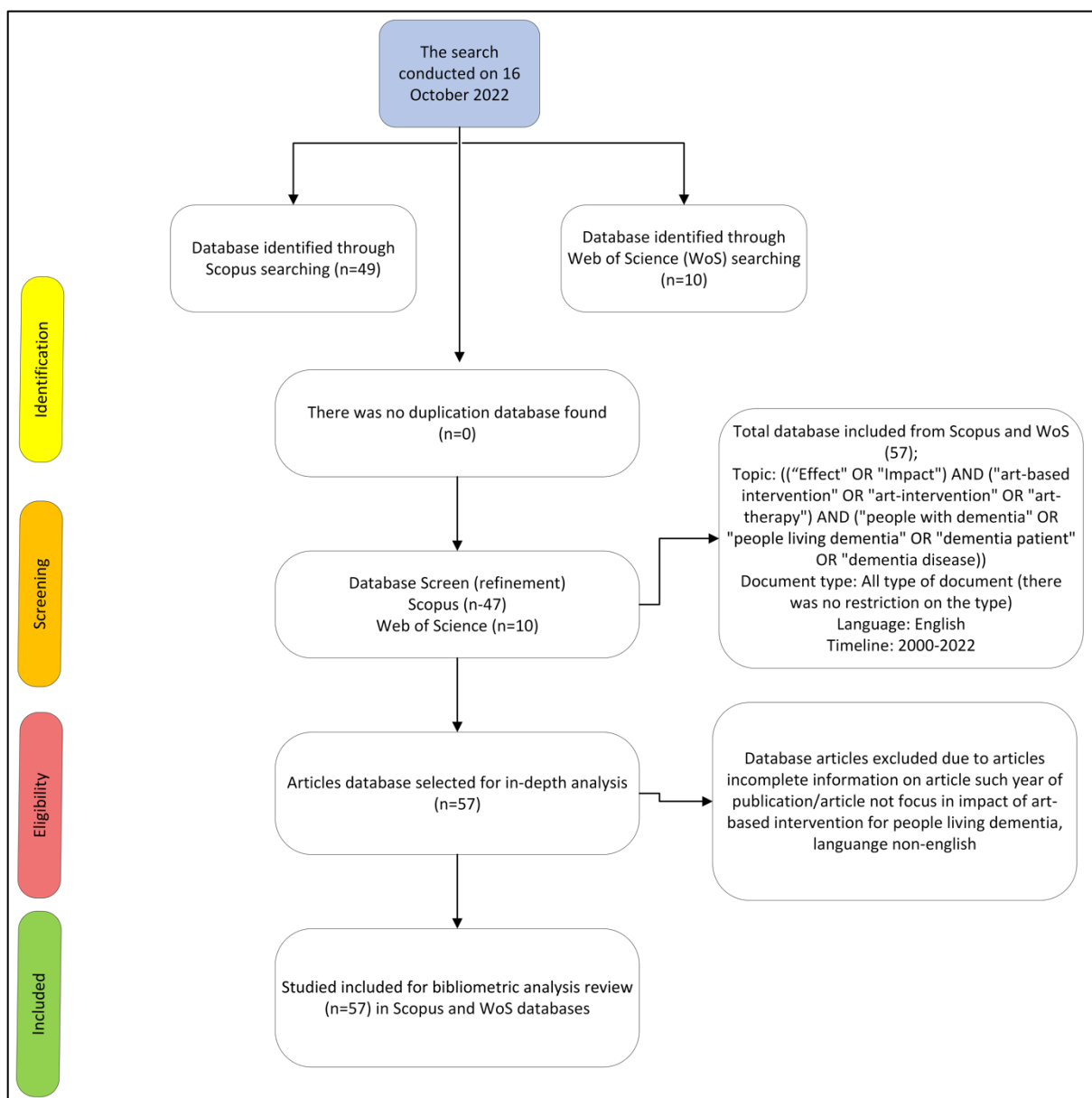


Figure 1 : Flowchart for study selection

3.2 Eligibility criteria (Screening process)

The researchers analysed 47 out of the 49 publications in the Scopus database, while 10 articles were analysed in the Web of Science database. At this stage, it is essential to conduct an in- depth analysis of all publications, paying close attention to the publications' titles, abstracts, and primary contents, to determine whether the publications fulfil the inclusion criteria, whether they are suitable for use in the current research, and whether they meet the goals. According to the findings of the study about the impact art-based intervention people living dementia, a total of 57 articles that comply will have to be analysed. The selection process was limited to papers published between the years 2000 and 2022. In addition, there was no limitation placed on the categories of articles that may be featured: no kind of article was restricted, except English.

Table 2 : The inclusion and exclusion criteria

Database Criteria	Eligibility	Exclusion
Document type	All type of document (there was no restriction on the type)	Not applicable
Language	English	Non-English
Timeline	2000 - 2022	<2000
Location and Country	Worldwide (there was no restriction on the type)	Not applicable

4. Data Analysis

RStudio and biblioshiny were used to perform a bibliometric analysis research based on a systematic analysis of literature on the impact of artificial intelligence in tourism. Open-source tools, like the bibliometrix R-package, are specifically created for bibliometric and scientometric analysis and include the relevant and cost-free R programming language. R is a free and multipurpose software application that provides open-source packages, such as the bibliometrix R-package. This package was developed specifically for bibliometric and scientometric research, and it is one of the R's open-source products. The bibliometric analyses of the current research might benefit from the use of the bibliometrix R package since it is a high-quality, comprehensive, and adaptable software application (Aria & Cuccurullo, 2017).

The researcher used RStudio 4.2.1 on an apple MacBookAir running on macOS Monterey. To install the bibliometric packages, researchers will run RStudio and execute `>install.packages("bibliometrix")` in the command line. After installing bibliometrix, the researcher should execute `>library(bibliometrix)`, then `>biblioshiny(bibliometrix)` on RStudio's command terminal to start the biblioshiny web-interface (Fakruhayat et al., 2022). Researchers used the biblioshiny programme to analyse data imported from the Scopus and Web of Science databases. A bibliometric analysis of the impact art-based intervention for people living dementia was performed to obtain a research output analysis of annual scientific production, country scientific production, the most relevant authors, the most relevant journals, the most frequent words and co- occurrence network, and country collaborations. The figure below depicts the characteristics of the biblioshiny web-interface that may be used to analyse data.

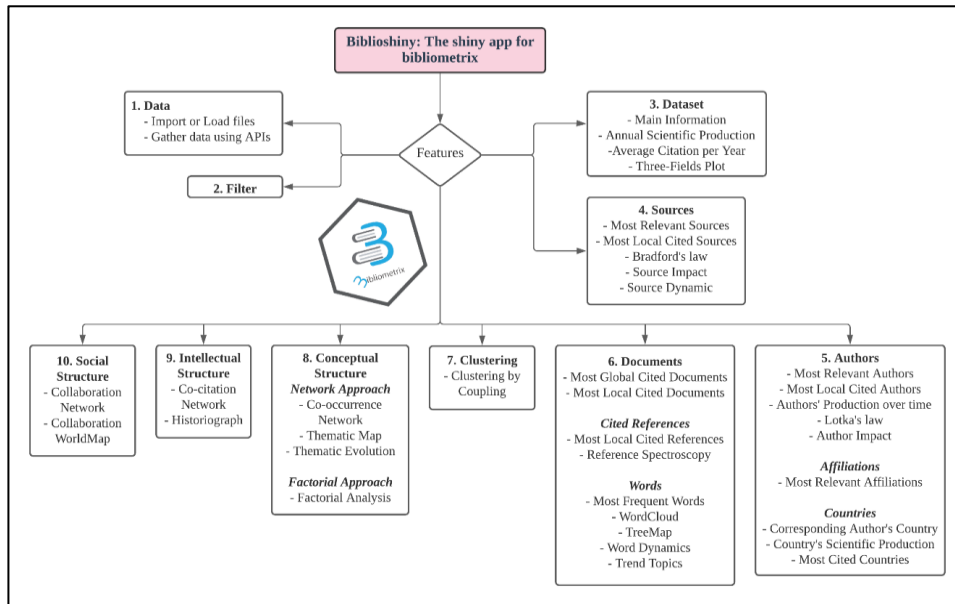


Figure 2 : Features of Biblioshiny app for bibliometrics
Source: (Fakruhayat et al., 2022)

5. Results

Researchers obtained 57 databases of publications (journal, book, book chapter, conference paper, review, etc.) on relevant topics to the impact art-based intervention for people living dementia from 2000 to 2022 by using the search strategy that was described above. These databases were obtained from two different sources that were indexed by Scopus and Web of Science.

5.1 Annual Scientific Production and Average Citation Per Year

Between the years 2000 and 2022, Scopus have a 47 documents and Web of Science 10 documents published a combined total of 57 research documents on the impact of art-based interventions had on people living dementia. In the Scopus database, the year 2021 had seen the publication of the most articles is 7 out of 47 documents. In addition, the worldwide trends in yearly scientific production are shown by the Scopus database show a shaky development from the year 2000 until the year 2022. According to Web of Science's yearly scientific production, the year 2021 have seen the publication of 4 out of 10 articles, making it the year with the most publications overall. In addition, analysis of worldwide trends in yearly scientific production between the years 2000 and 2021 revealed a significant rise in the number of publications. In addition, the annual growth rate was 5.65%, as reported by Scopus, but it was 0%, as reported by Web of Science.

Table 3 : Annual scientific publications and average citation per year from 2000 to 2022

Scopus					Web of Science			
Year	N Documents	MeanTCperArt	MeanTCperYear	Citable Years	N Documents.	MeanTCperArt	MeanTCperYear	Citable Years
2000	0	0.00	0.00	0	0	0.00	0.00	0
2001	0	0.00	0.00	0	0	0.00	0.00	0
2002	1	171.00	8.55	20	0	0.00	0.00	0
2003	0	0.00	0.00	0	0	0.00	0.00	0

2004	0	0.00	0.00	0	0	0.00	0.00	0
2005	0	0.00	0.00	0	0	0.00	0.00	0
2006	1	95.00	5.94	16	0	0.00	0.00	0
2007	1	86.00	5.73	15	0	0.00	0.00	0
2008	0	0.00	0.00	0	0	0.00	0.00	0
2009	1	18.00	1.38	13	0	0.00	0.00	0
2010	0	0.00	0.00	0	0	0.00	0.00	0
2011	2	40.00	3.64	11	0	0.00	0.00	0
2012	0	0.00	0.00	0	0	0.00	0.00	0
2013	1	13.00	1.44	9	0	0.00	0.00	0
2014	4	44.25	5.53	8	0	0.00	0.00	0
2015	0	0.00	0.00	0	0	0.00	0.00	0
2016	6	27.50	4.58	6	1	7.00	1.17	6
2017	5	19.80	3.96	5	1	29.00	5.80	5
2018	7	13.43	3.36	4	1	20.00	5.00	4
2019	3	4.67	1.56	3	1	11.00	3.67	3
2020	5	3.00	1.50	2	1	2.00	1.00	2
2021	7	3.86	3.86	1	4	2.25	2.25	1
2022	3	0.67	0.00	0	1	4.00	0.00	0

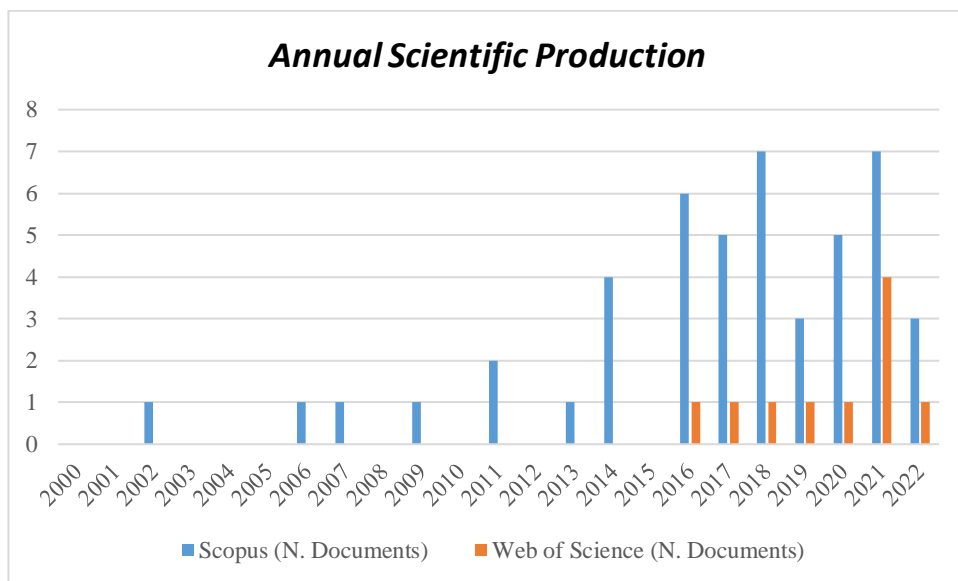


Figure 3 : Annual scientific publications from 2000 to 2022

5.2 Most Relevant Journals (Sources)

Within Ten publication documents, the Web of Science database found seven different journals. The most relevant journals that have published a significant number of articles on the impact of art-based intervention for people living dementia are shown in the table below. The results of the analysis indicate that one of the most widely read journals is the Dementia-International Journal of Social Research and Practice. This publication has a total of 34 citations, 2 *h index*, and 4 *g index*, and it has published 4 documents. The Activities Adaptation & Aging journals came in at number two on the list with a total of four citations, one *h index*, one *g index*, and one published document. The Geriatrics and Gerontology International journals have been received 29 citations, making them the journals with the second highest total number of citations.

Table 4 : Top most relevant journals articles in impact art-based intervention for people living dementia research (WoS)

Most Relevant Journal (Web of Science)	N. Documents	h_index	g_index	m_index	TC
Dementia-International Journal Of Social Research And Practice	4	2	4	0.4	34
Activities Adaptation \& Aging	1	1	1	1	4
Arts \& Health	1	1	1	0.5	3
Geriatrics \& Gerontology International	1	1	1	0.167	29
Journal Of Alzheimers Disease Reports	1	1	1	0.5	5
Journal Of Museum Education	1	1	1	0.143	7

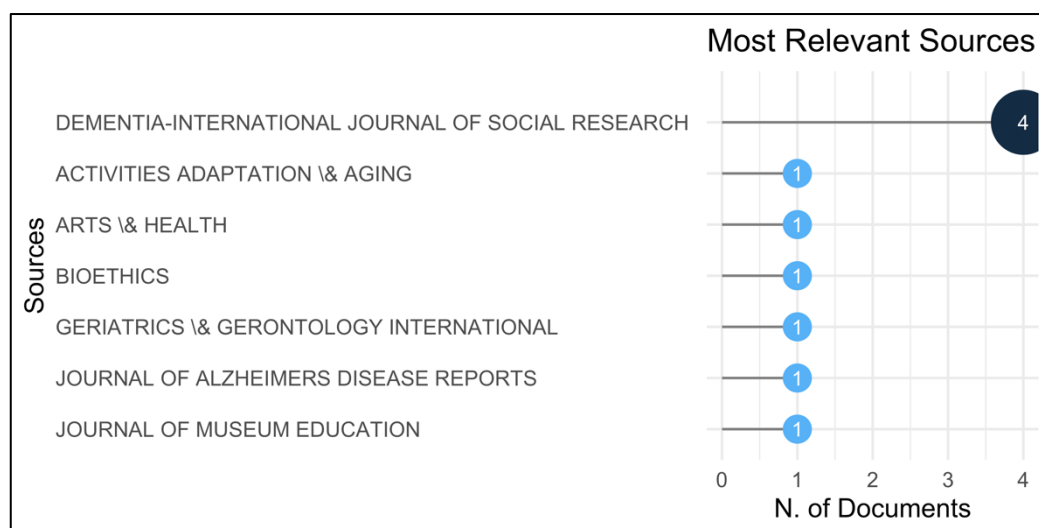


Figure 4 : Top most relevant journals articles in in impact art-based intervention for people living dementia research (WoS)

In 47 publication documents, the Scopus database recognised 33 journals. The top ten most relevant journals that published a large number of documents related to the impact art-based intervention for people living dementia research are included in the table below. The most popular journals, according to the study's results, are Dementia, which has Seven documents published, 5 *h index*, 7 *g index*, and

120 total citations. Aging and Mental Health journals came in second with three published papers, while Alzheimer Disease and Associated Disorders journals came in fifth with one published document. The Cochrane Database Of Systematic Reviews journals received the most total citations with 217 citation.

Table 5 : Top most relevant journals articles in impact art-based intervention for people living dementia research (Scopus)

Most Relevant Journal (Scopus)	N. Documents	h_index	g_index	m_index	TC
Dementia	7	5	7	0.714	120
Aging And Mental Health	3	3	3	0.333	212
Cochrane Database Of Systematic Reviews	3	3	3	0.143	217
Arts And Health	3	2	3	0.4	12
Alzheimer Disease And Associated Disorders	1	1	1	0.083	62
Asia-Pacific Psychiatry	1	1	1	0.143	2
Bmj Case Reports	1	1	1	0.25	3
Conference On Human Factors In Computing Systems - Proceedings	1	1	1	0.333	1
Dementia And Geriatric Cognitive Disorders	1	1	1	0.1	13
Geriatrics And Gerontology International	1	1	1	0.167	31

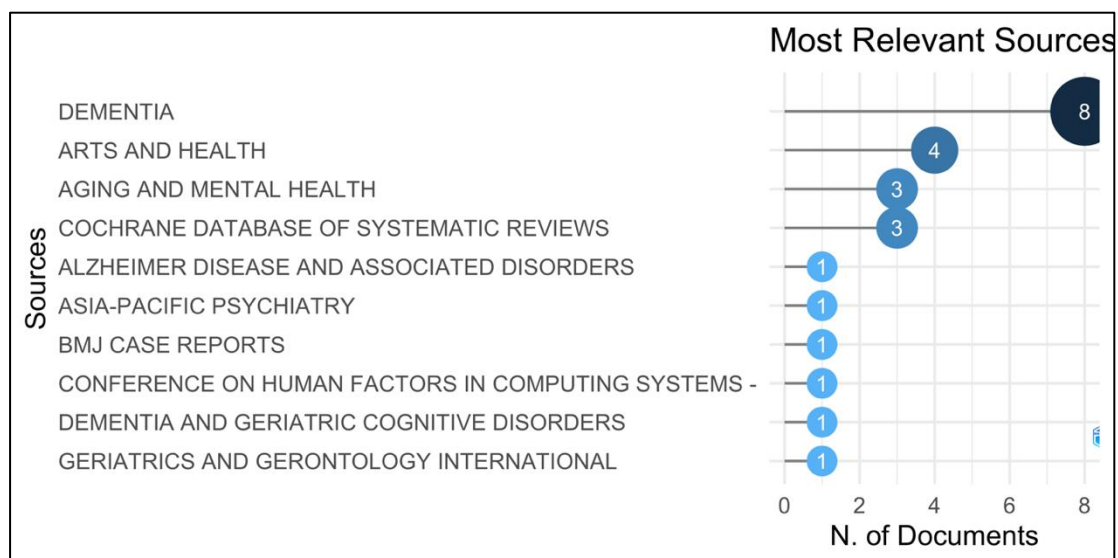


Figure 5 : Top most relevant journals articles in impact art-based intervention for people living dementia research (Scopus)

5.3 Most Frequent Words and Co-Occurrence Network

The author's keyword is registered as 40 in the Web of Science database of 10 documents database, and the number of keywords plus is recorded as 31. These keywords has been utilised in the impact art-based intervention for people living dementia study, according to researchers from across the world. The table below contains a list of the top author's keywords and keyword plus combinations

that appear most often in research articles on the impact of art-based intervention for people living dementia studies. The author's keywords most frequently used include "dementia" (7 occurrences), "art therapy" (3 occurrences), "creativity" (3 occurrences), and so on. Meanwhile, the keyword plus analysis revealed that "care" was the most frequently used (5 times), followed by "alzheimers-disease" (4 times), "therapy" (4 times), and so on.

Table 6 : The most top 20 frequently utilized author's keywords in impact art-based intervention for people living dementia research (WoS)

Author's Keywords		Keywords Plus	
Words	Occurrences	Words	Occurrences
dementia	7	care	5
art therapy	3	alzheimers-disease	4
creativity	3	therapy	4
visual arts	3	impact	3
well-being	3	program	3
adults	1	art-therapy	2
alzheimer's	1	engagement	2
alzheimer's disease	1	older-people	2
angus dawson	1	people	2
art appreciation and	1	quality-of-life	2
art museum-based intervention	1	adults	1
arts and related therapy	1	antipsychotics	1
behavioral and psychological symptoms of dementia	1	benefits	1
behavioral and psychotic symptoms of dementia	1	caregivers	1
cognition	1	cerebrovascular events	1
comparative assessment	1	creativity	1
creative activity	1	dance	1
creative arts	1	decision	1
creative self-expression	1	efficacy	1
decent society	1	experiences	1

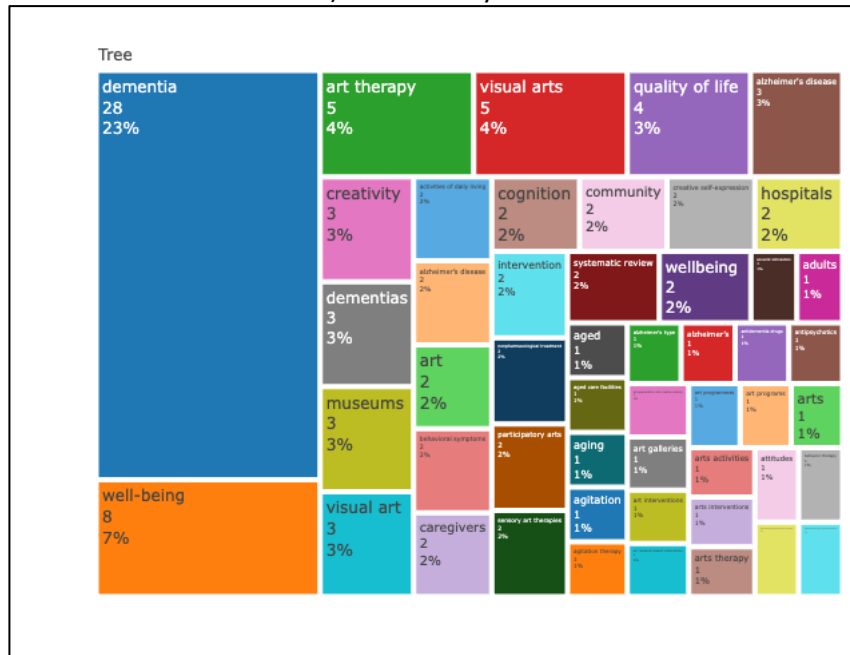
a) Author keywords

top 20 keywords used in Scopus-published research on the effect of art-based interventions for people who have dementia. These terms are included in the table below. In this field of study, the author's most often used terms were "dementia" (28 times), "well-being" (8 times), "art therapy" (5 times), and "visual arts" (5 times), and many others. The results of the keyword plus analysis revealed that the term "dementia" was used the most (75 times), followed by "art therapy" (49 times), "human" (37 times), and "aged" (35 times), among other relevant keywords.

Table 7 : The most top 20 frequently utilized author's keywords in impact art-based intervention for people living dementia research (Scopus)

Author's Keywords		Keywords Plus	
Words	Occurrences	Words	Occurrences
dementia	28	dementia	75
well-being	8	art therapy	49
art therapy	5	human	37
visual arts	5	aged	35
quality of life	4	male	34
alzheimer's disease	3	humans	33
creativity	3	quality of life	32
dementias	3	female	26
museums	3	treatment outcome	19
visual art	3	psychology	16
activities of daily living	2	cognition	14
alzheimer,Ãs disease	2	middle aged	14
art	2	caregiver	13
behavioral symptoms	2	music therapy	13
caregivers	2	aged 80 and over	11
cognition	2	art	11
community	2	article	11
creative self-expression	2	caregivers	10
hospitals	2	priority journal	10
intervention	2	review	10

a) Author keyword



b) Keyword plus

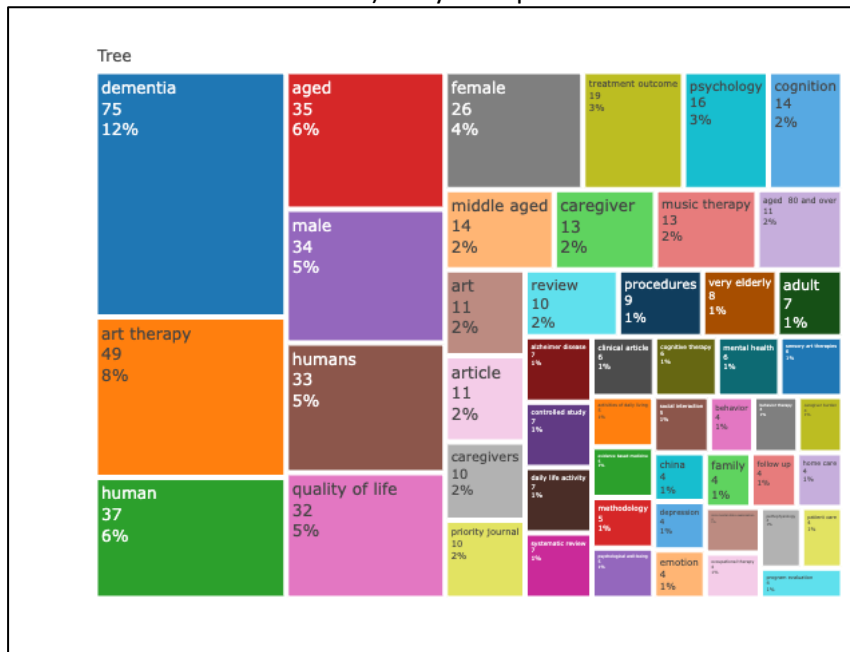


Figure 7 : Tree map of top 50 frequently utilized a) author’s keywords and b) keyword plus impact art-based intervention for people living dementia research (Scopus)

5.4 Most Relevant Authors

The research revealed 26 different authors in research articles published in the Web of science database on the impact of art-based intervention for people living dementia. A list of the top 10 authors was provided. These researchers, Charura, D., and Surr, C., each have three documents in the field of research that this study was investigating at. According to the research findings, another author has published two and one documents respectively. According to results, Chen, L., Y., has received the most total citations of any of the top ten overall authors. His article has received a total of 29 citations.

Table 9: Top 10 most relevant author in in impact art-based intervention for people living dementia (WoS)

Authors's Name	Articles	Percentage (%)	h_index	g_index	m_index	TC
Charura D	3	1.00	2	2	1	8
Surr C	3	1.00	2	2	1	8
Shoesmith E	2	0.67	2	2	1	7
Adams AK	1	0.25	1	1	0.2	20
Cabrero-Montes EM	1	0.25	1	1	0.333	2
Chen LK	1	0.20	1	1	0.167	29
Chen LY	1	0.20	1	1	0.167	29
Del Signore D	1	0.33	1	1	0.143	7
Emblad SYM	1	0.50	1	1	0.5	5
Gonzalez-Ingelmo E	1	0.25	1	1	0.333	2

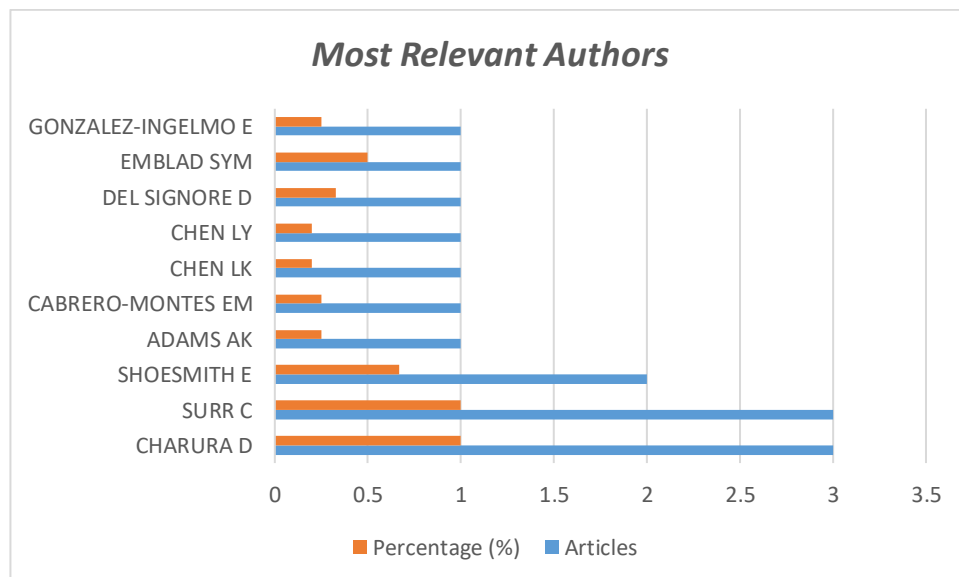


Figure 8 : Top 10 most relevant author in impact art-based intervention for people living dementia (WoS)

In 47 Scopus publications, a total of 165 authors contributed to the research on the impact of art-based intervention for people living dementia. The table below lists the top 10 authors. According to the findings, one author named Camic, P., M., authored a total of six publications in that study. This author was followed by Tischler V with four publications, Schneider J recorded with three publications, and Cardno, A., with two articles. The data also reveals that Camic, P., M., has the most total citations among the top 10 overall authors, with 261 citations.

Table 10: Top 10 most relevant author in impact art-based intervention for people living dementia (Scopus)

Author's Name	Articles	Percentage (%)	h_index	g_index	m_index	TC
Camic PM	6	1.67	4	6	0.444	261
Tischler V	4	1.17	3	4	0.333	211
Schneider J	3	1.45	2	3	0.4	22
Cardno A	2	0.67	2	2	0.222	46

Charura D	2	0.67	2	2	1	6
Crutch SJ	2	0.50	2	2	0.4	14
Deshmukh SR	2	0.67	2	2	0.222	46
Holmes J	2	0.67	2	2	0.222	46
Lokon E	2	0.58	2	2	0.286	50
Sauer PE	2	0.58	2	2	0.286	50

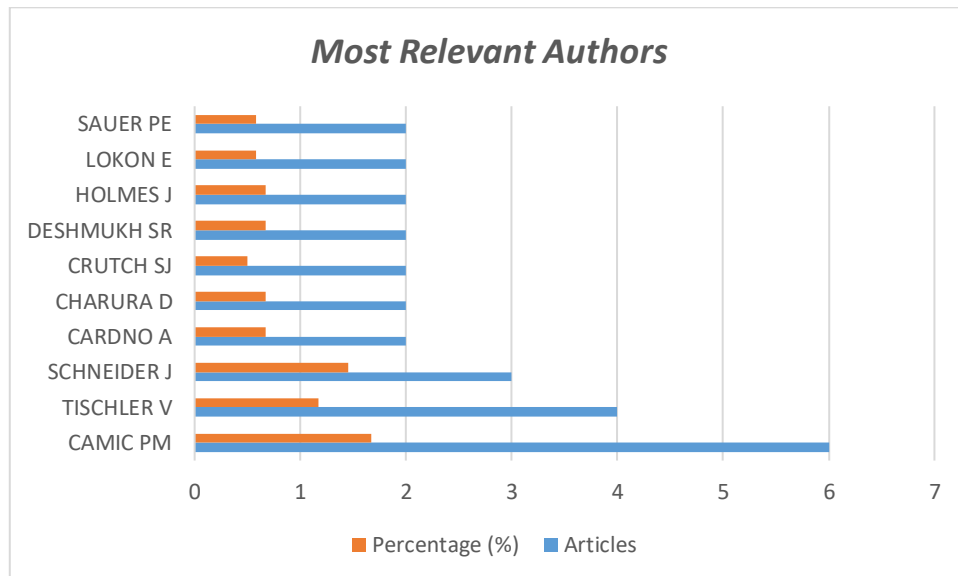


Figure 9 : Top 10 most relevant author in impact art-based intervention for people living dementia (Scopus)

5.5 Country Scientific Production and Most Top Affiliations

When researchers analyze each country's contribution to the body of knowledge available in the Web of Science database, researchers discover that the United Kingdom has made the most significant contribution, with a total of 11 documents to its credit. It is followed by the United States of America, which normally has around 8 documents, and China, which has 4 documents published, making it the third largest country in terms of total number of publications produced. According to the study of the topmost famous affiliations, Leeds Beckett University published 8 documents, followed by Miami University, which published 4 documents.

Table 11 : Country scientific production and most top affiliations in impact art-based intervention for people living dementia (WoS)

Country	N. Documents	Affiliations	N. Documents
UK	11	Leeds Beckett University	8
USA	8	Miami University	4
China	4	Art Inst Chicago	2
Germany	2	Ctr Geriatr And Gerontol	2
Poland	2	Ctr Referencia Estatal Atenc Personas Con Enferme	2
Spain	2	Goethe University	2

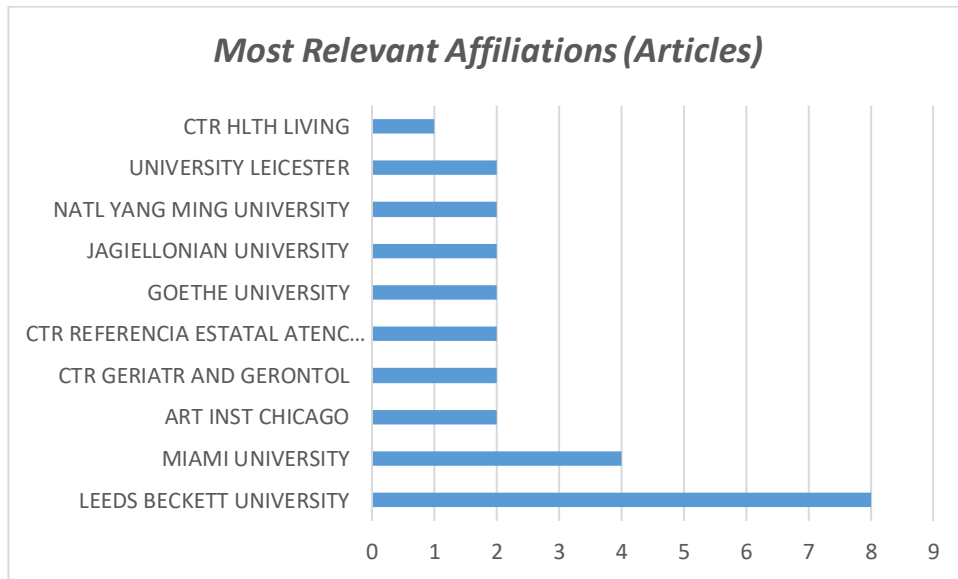


Figure 10 : Top 10 most relevant affiliations in impact art-based intervention for people living dementia (WoS)

In this section, the researchers analyzed the different patterns of scientific production and most affiliations discovered in the Scopus database throughout the world. The United Kingdom has around 70 articles, making it the country with the highest level of worldwide scientific production. However, the United States follows closely after with around 35 articles, and Spain, which ranks third with a total of 14 publications and is the most prolific country in terms of publication production. According to the findings of the researcher's analysis, Canterbury Christ Church University has the most notable affiliations with 11 documents published, followed by the University of Nottingham with 8 documents, and so on.

Table 12 : Country scientific production and most top affiliations in impact art-based intervention for people living dementia (Scopus)

Country	N. Documents	Affiliations	N. Documents
UK	70	Canterbury Christ Church University	11
USA	35	University Of Nottingham	8
Spain	14	Leeds Beckett University	6
Germany	13	Bangor University	5
Canada	11	Miami University	5
China	9	University Of York	5
Netherlands	9	Beth Israel Medical Center	4
South Korea	5	Centro De Referencia Estatal De Atención A Personas Con Enfermedad De Alzheimer Y Otras Demencias – Imserso	4
Japan	4	Complutense University	4
Portugal	4	Goethe University	4

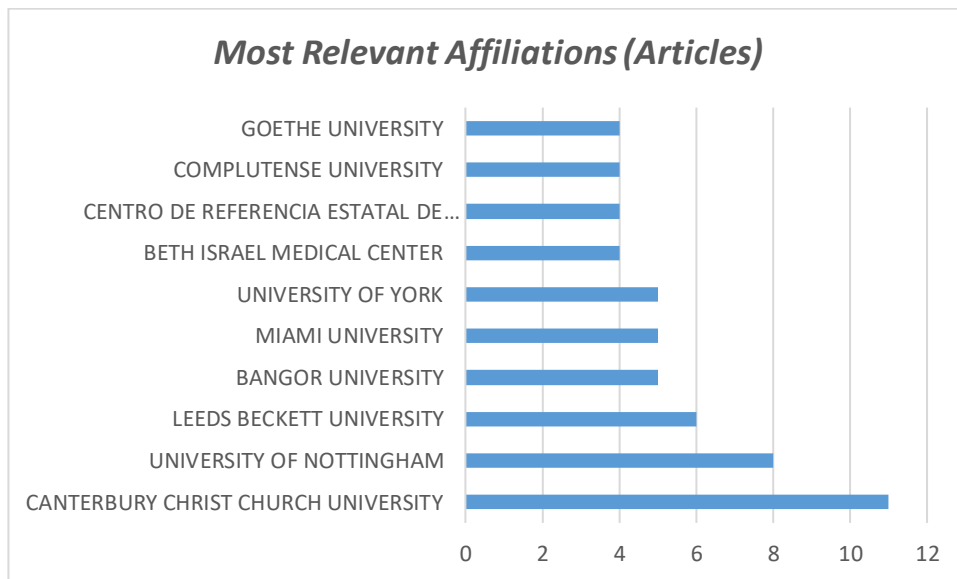


Figure 11 : Top 10 most relevant affiliations in impact art-based intervention for people living dementia (Scopus)

6. Discussion

The use of art in health is increasingly becoming an option as a non-pharmacological treatment. This is because, there have been many studies done on patients using art therapy. Dementia patients are expected to increase year after year, allowing for a variety of treatment options, including art therapy.

Scopus and Web of Science databases were used to conduct the first bibliometric analysis of the effects of art-based interventions on dementia patients. Researchers use bibliometric analysis to find correlations between publications and research trends by analysing scientific articles quantitatively (Şenel & Demir, 2018). A bibliometric analysis was performed to analyse global trends in the effects of art-based intervention for dementia patients from 2000 to 2022. with a focus on specific topics in that area. Annual scientific production and average citations per year, the most relevant journals, the most relevant keywords, the most relevant authors and author production over time, national scientific production, and cross-national collaboration to obtain research results have all been analyzed.

Articles published on this subject between 2000 and 2022 have been compiled into a comprehensively analysed research summary. As a result, a comprehensive bibliometric analysis of the output and a look at research activities on the effects of art-based interventions on dementia patients have been prepared. In the current analysis, the researchers concluded that the number of annual scientific publications in Scopus had a significant increase in the global trend from 2016 to 2021, while the number of scientific publications in the Web of Science database experienced a significant increase in 2021.

Various factors contributed to the increase in research on the effects of art-based interventions for dementia patients. Among these factors is the increased awareness among the community about the need for dementia treatment as well as the increasing trend of the dementia patient population, which increases every year. The most popular journals, according to the analysis, are *Dementia* in Scopus and *Dementia: An International Journal of Social Research and Practice* in Web Science. The author keyword and the added keyword in the most frequently used disciplinary topic are “dementia” in Scopus, while in Web of Science the author keyword is “dementia” and the added keyword is “effect”. According to the findings, it was found that the author with the name Camic, P., M., is the most famous author in Scopus, and meanwhile, in the Web of Science database, it is Charura, D., and

Surr, C. The UK has the highest contribution to the production of scientific articles in Scopus and Web of Science. The most notable affiliation from Scopus is Canterbury Christ Church University, while the most notable affiliation from the Web of Science is Leeds Beckett University. According to Web of Science and Scopus, the majority of researchers from Europe use art-based interventions against people living with dementia when compared to other continents; the second highest number comes from Asia.

7. Conclusion

In conclusion, using art-based interventions with people who have dementia has many benefits and is becoming more and more popular. As mentioned earlier in this article, the use of art-based intervention for people living with dementia can provide other options other than drugs to treat dementia. Art-based intervention has a good effect on dementia patients, which can improve cognitive function and behavior; thus, this method is increasingly gaining a place in the treatment of dementia with various art-based intervention methods such as painting, music, singing, and so on. This article presents a review of the literature and a bibliometric analysis of the effect of art-based intervention on people living with dementia to identify the areas where the annual scientific production and average citations per year, the most relevant journals, the most frequent keywords, the most relevant authors, the author's production from time to time, country scientific production, and affiliation contributed the most. Bibliometric analysis using 57 research documents collected from Scopus and Web of Science.

The main result of this study is that, according to the bibliometric analysis, there was a significant increase from 2016 to 2021 in the annual scientific production in Scopus, while in the Web of Science database there was a significant increase in 2021. The findings show that the most popular journal in Scopus is the journal *Dementia* while the journal *Dementia-International Journal of Social Research and Practice* in Web Science. In Scopus, the most frequently used author keyword and add keyword in topic discipline are "Dementia", while in Web of Science, the author keyword is "Dementia" and the add keyword is "Impact". It has been found that Camici, P., M., is the most popular author in Scopus and Charura, D., and Surr, C in the Web of Science database. In Scopus and Web of Science, the UK country contributes the most in terms of the production of scientific articles. The most notable affiliation from Scopus is Canterbury Christ Church University, while the most notable affiliation from the Web of Science is Leeds Beckett University.

This study was conducted to close the gap in previous studies by using the Scopus and Web of Science databases, as well as performing a comprehensive analysis of the results of art-based interventions on people living with dementia from 2000 to 2022. Researchers recommend evaluating future studies and focusing on articles from other databases to see if comparable trends for the effects of art-based intervention in dementia tourism and other related issues exist.

Declarations

The manuscript has not been submitted in any other journal or conference.

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Conflicts Of Interest

There are no conflicts to declare.

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