

Science Mapping Research on Citizenship **Education: A Bibliometric Review** 

Mahmut Bozkurt 问 Sinop University, Turkey

Önder Ervılmaz 匝 Amasya University, Turkey

Celal Boyraz 匝 Bayburt University, Turkey

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# Science Mapping Research on Citizenship Education: A Bibliometric Review

Mahmut Bozkurt, Önder Eryılmaz, Celal Boyraz

Article Info	Abstract
Article History	The main objective of this study is to evaluate Citizenship Education (CE)
Received: 11 February 2021 Accepted: 09 September 2021	literature through systematic bibliometric analysis. The science mapping method was conducted to analyze data. Because CE is also studied with the names of social studies and civic education in the literature, articles related to these topics were included in the study. 4029 articles and proceeding papers that were obtained from the WoS database were analyzed. As a result of the study, it was revealed that number of publications has been dramatically increased in recent
<i>Keywords</i> Citizenship education Social studies Civic education Science mapping Bibliometric analysis	years. Moreover, Theory and Research in Social Education Journal was found as the most relevant source in terms of number of publications about CE. Furthermore, the study conducted by Westheimer and Kahne in 2004 was determined as the most influential source that has the most citations per year in the field. Finally, it was found that USA and UK are the most productive, most cited, and most collaborative countries in terms of scientific publications.

# Introduction

Citizenship education (CE) has been one of the most dynamic, important and controversial issues for countries' educational policies. In the historical process, countries attributed different meanings to the term 'citizen' in line with their own policies and values and they aimed to raise citizens accordingly. Therefore, making universal or broadly accepted definitions regarding CE is very difficult. CE differs not only from country to country but also from time to time. For instance, a regime change occurred in a country directly affects the policies adopted by that country, as a consequence, CE changes since it aims to raise citizens with the desired characteristics. CE is affected not only by a regime change but also by every event and phenomenon affecting the whole world (Cristol et al, 2010; Heater, 2001). Therefore, the content and scope of CE constantly change and are associated with different fields, concepts, and approaches as a result of both national and international developments.

# **Citizenship Education**

In its simplest form, CE can be defined as raising individuals as effective and responsible citizens living in democratic countries (Hebert & Sears, 2001). There are broad different approaches exist in the literature regarding CE such as cosmopolitan citizenship education (Osler & Starkey, 2003; 2018), multicultural citizenship education (Banks, 2001; Kymlicka, 2011), critical citizenship education (Johnson & Morris, 2010;

2011; Trivers & Starkey, 2012), democratic citizenship education (Parker, 1996; 2008; Waghid, 2005). Accordingly, definitions of CE vary and therefore, presenting a definition that everyone or most people agree is difficult. Keating (2014) explained this situation regarding CE by saying, "a complex phenomenon that can be hard to pin down – conceptually, analytically and empirically."

CE became a separate academic discipline, especially in the second half of the 20th century (Veugelers & Groot, 2019). From past to present, CE associated with curriculum content, classroom activities, and teaching controversial issues as well as multicultural education, diversity, pluralism, human rights, and globalization. As a result of associating with such broad fields, the literature related to CE is expanded. Moreover, as a result of various factors such as the end of the cold war in recent years; increasing interest in human rights; democratization movements in Latin America, Central and Eastern Europe and the Middle East; the diffusion of the liberal economic system; rising interest in global-connectedness; the increasing presence of supranational and intergovernmental organizations such as UN, EU, UNICEF, UNESCO, and G8 in decision-making mechanisms; increase in terrorist activities; and integration efforts due to increase in migration flows in western countries, CE became attractive as a research field and the academic literature on CE expanded considerably (Keating et al., 2009; Osler & Starkey, 2003; Sen, 2019). So, both local and international developments directly influenced the CE and still continue to influence. From this point of view, the COVID-19 pandemic, which affecting everything all over the world and radically changing almost everything we do, is also expected to affect studies on CE and add new dimensions to the literature on CE.

This effective concept in such a wide range can take shape depending on the developments and vary from society to society, also called by different names in the literature by different countries or education levels. An examination of the education systems of different countries revealed that courses associated with CE are included in different education levels with different names; "citizenship education", "civic education", or "social studies education" (Öztürk & Deveci, 2011; Sim & Print, 2005; Torney-Purta et al., 1999; Torney-Purta et al., 2001). As a result, CE is examined, associated, and evaluated with terms such as "civic education" and "social studies" in the literature. Since the research on CE is spread over a wide range and continuous increase in research speed, new studies that evaluating the literature and revealing the latest trends are needed. A literature survey indicated that there are reviews examining and evaluating the studies carried out in different countries related with CE (Crick, 2005; Eryılmaz et al., 2021; Geobers et al., 2013; Lin, 2015; Osler & Starkey, 2006; Quaynor, 2012; Sears, 1994). Among various evaluative studies on CE, increasing number of studies has been published evaluating the research in global citizenship education (Estelles & Fischman, 2020; Goren & Yemini, 2017; Horey et al., 2018; Pashby et al., 2020; Yemini, et al., 2019).

As a result of the fact that CE is included in "social studies" in English-speaking countries such as USA, Australia, and Canada, a great number of studies are available that reviewing and evaluating research related to social studies. Moreover, it is noteworthy that many reviews found evaluating dissertations on social studies (Canbulat et al., 2016; Chapin, 1974; Hepburn & Dahler, 1983; Oğuz Hacat & Demir, 2018; Öner & Öner, 2017; Şahin et al., 2011; Wrubel & Ratliff, 1978; Tarman et al., 2010). Furthermore, among the research related to social studies education, studies associated with various topics are available such as meta-analysis

(Fitzpatrick, 2018; Garwood et al., 2019; Graham et al., 2020; Gürdogan Bayır & Bozkurt, 2018; Swanson et al., 2014; Yasar et al., 2015; Yukhymenko, 2011), meta-synthesis (Uygun, 2020; Yoder et al., 2016), and metaethnography (Tannebaum, 2015). In addition to these, evaluative studies were also conducted that examining studies on social studies and technology subjects (Beck & Eno, 2012; Berson, 2014; Whitworth & Berson, 2002). Moreover, a small number of evaluative studies exists examining research on civic education (Cohen, 2019; Garces, 2020).

A large number of evaluative research studies, especially regarding studies on CE, civic education, and social studies are available in the literature. It can be argued that the majority of these studies were carried out only in one country and associated with different subjects. Moreover, it is surprising that a limited number of reports were evaluated in these studies. Furthermore, a literature survey indicated that there are no studies examining and exploring the literature of CE through bibliometric analysis. Therefore, the authors suggest that a study is needed to enable us to see the big picture regarding the literature of CE and provide us with new insights into this field. Additionally, since our study covers the years 1975–2020, it may enable making a comparison regarding the influence of Covid-19, which started in 2019 and effects are still felt today in 2021, on CE. In order to fill this gap in the literature, the current study aims to examine and evaluate studies on CE through bibliometric analysis.

# Method

Since examining the thematic change regarding the literature of CE and social studies was aimed, science mapping methodology was adopted in the present study. Science mapping is a generic process technique that creates bibliometric maps to analyze the network and relationship of studies, reports, or authors conducted in certain disciplines or specialties (Cobo et al., 2011; Small, 1999). The technique includes the performance indicators of the related literature and known as science mapping. Science mapping primarily aims at evaluating the productivity and popularity of different actors based on bibliographic data. It creates structural and cognitive models of the field by visualizing the main topics synchronously (Callon et al., 1983; Noyons & van Raan, 1998) or diachronically (Garfield, 1994; Cobo et al., 2011). This method allows analysis of multiple reports obtained from a database by science mapping through bibliometric tools (Hallinger & Kovacevic, 2019).

Roemer and Borchart (2015) defined that bibliometry is a concept based on the prevalence and acceptance of a printed material as the main means of communication between scholars and experts in a discipline. Accordingly, to determine the productivity of authors in a particular discipline, one of the most widely used methods of bibliometrics, citation analysis was used in the present study. Citation analysis allows to uncover the trends in the literature over the years, the contributions of countries to the literature on the basis of institutions, social networks among countries, the most influential writers in the literature, and the most frequently used sources (Zupic & Čater, 2015).

Every scientific field or topic can be characterized by a set of keywords (Hubert, 1980) given by authors of the publications or citation indexes (e.g. KeyWord Plus algorithm of Web of Science). Starting from a keyword set

and its representation as a formation of the common network, the knowledge base included in the analyzed collection can be exhibited (He, 1999) and different themes developed in this research area can be examined (Van Meter et al., 2004). The databases such as PubMed, Scopus, Web of Science (WoS), and Google Scholar are generally used in science mapping studies. The datasets obtained from these databases are analyzed using bibliometric methods and the performance of the field examined is determined. The use of bibliometric methods enables making more objective and reliable analyzes based on statistical techniques. This methodology enables making both general (e.g. number of studies by years) and advanced (e.g. use of co-author and co-authoring) analysis of the enormous documentation collected from a relevant database of the literature (Diodato & Gellatly, 2013). Bibliometric tools for network analysis can be used to visualize and examine the data in the science mapping and allows analyzing the social, intellectual, and conceptual structure of the research field. Specifically, these kinds of tools aim at visualizing links between sources, publications, or authors, considering the scope of the analysis (Marshakova, 1981).

The unit of analysis in science mapping is a domain of scientific knowledge where contributions of members of a scientific community or more specifically, contributions based on their defined specialties are collectively presented (Chen, 2017). Bibliometric analysis can be performed through various open-source software packages. However, many of these software packages could not assist scholars in the recommended workflow. The most convenient tools are CitNetExplorer (Van Eck & Waltman, 2014), VOSviewer (Van Eck & Waltman, 2010), SciMAT (Cobo et al., 2012), BibExcel (Persson et al., 2009), Sci2 tool (Sci2 Team, 2009), CiteSpace (Chen, 2006), and VantagePoint (www.thevantagepoint.com). Additionally, R Studio is a frequently used tool in science mapping. A bibliometrix software package using R Studio platform was employed in the present study. The bibliometrix R-package is defined as follows (Aria & Cuccurollu, 2017):

"The bibliometrix R-package provides a set of tools for quantitative research in bibliometrics and scientometrics. The existence of substantial, effective statistical algorithms, Access to high-quality numerical routines, and integrated data visualization tools are perhaps the strongest qualities to prefer R to other languages for scientific computation."

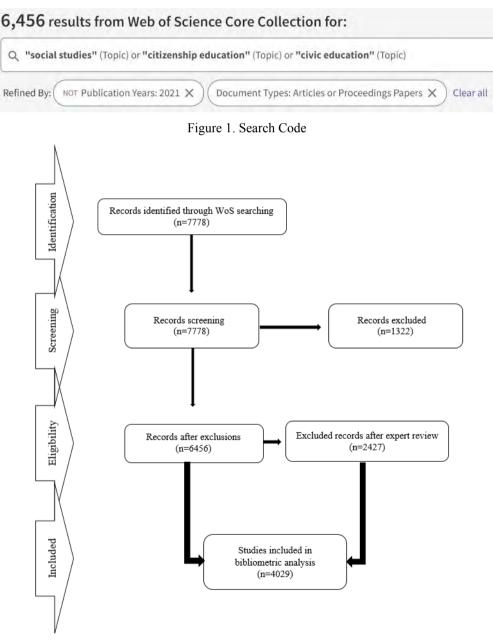
### **Definitions of Sources**

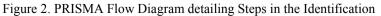
WoS was selected as the database for our study by taking into consideration the scope of research. This choice was done based on the comparison study carried out by Falagas, Pitsouni, Malietzis and Pappas (2008). Falagas et al., (2008) determined that the PubMed database indexes medical publications and does not have citation analysis, Google Scholar does not provide a compilation of publication and citation data and subject classification. Moreover, they found that a large fraction of the Scopus database includes publications in the life and health sciences, on the other side, WoS has extensive coverage of social sciences publications. In a comparison study carried out by Karasözen, Bayram and Zan (2011), it was stated that the WoS database provides a more extensive database for category terms of social and human sciences compared to the Scopus database. Accordingly, to achieve the best results in this research, the data was obtained from the WoS database. Following the database selection, the time period covered in the study was determined. To provide an extensive analysis of CE and social studies fields, the study was decided to cover a time period from 1975, the oldest date

in the WoS database, to the end of 2020.

#### Search Strategy

A systematic review was conducted in the study. PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses) (see Figure 1) directives were applied (Moher et al., 2009). First, different search combinations including terms, "social studies education", "citizenship education", "education", "social studies", and "civic education" were evaluated. Considering the displayed results and the historical development of CE and its relationship with social studies education, the search terms were determined as keywords of "Social Studies" OR "Citizenship Education" OR "Civic Education". The search code is given in Figure 1 and diagram is given Figure 2.





The total number of studies displayed using these search terms without any limitation is 7778. The total number of studies displayed in the first search with the exclusion criteria determined in the search code is 6456. To determine the studies that will be included in the analysis, the suitability of all results was then examined by the authors and 2427 studies that were not associated with the field were excluded from the dataset. Therefore, a dataset including 4029 studies was selected for analyzes and converted to a "plain text".

The analyses of the obtained data were done using R Studio (ver. 1.3.959) software developed by R Core Team (2018). Citations, authors, and keywords are the topics included in the bibliometric analysis. Citation analysis calculates the number of times a study/author in the dataset of the researchers has been cited by others. Cocitation analysis determines the 'similarity' of two items by examining the frequency of items that are cited together in the reference list of the researchers (Small, 1973). Analysis of the authors displays cooperation between authors, countries, and institutions. Keyword analysis examines the frequency of "common" words in the titles, keywords, and indexes of documents in the dataset reviewed and provide information regarding the most researched topics and concepts (Zupic & Čater, 2015). Accordingly, the general information regarding the obtained dataset is shown in Table 1. As seen in Table 1, the 4029 studies included in the dataset published in the years 1975–2020 were written by 5575 authors. Almost half of these studies (2009) were single-authored papers. Considering the screening was covered 45 years, the average number of studies produced annually is 89.53. Regarding the citations, each study received an average of 6.197 citations.

Timespan	1975–2020 (45 years)
Documents	4029
Documents per year	89.53
Authors	5575
Single-authored documents	2009
Authors of single-authored documents	1626
Authors of multi-authored documents	3949
Author appearances	7465
Documents per author	0,723
Authors per document	1,38
Co-Authors per documents	1,85
Collaboration index	1,95
Citations per document	6,197
Authors' keywords	5569
Keywords plus	1712

Table 1. General Information of the Dataset

### Results

The results obtained by analysis are evaluated in terms of general information about research; the relationship of references with each other; the relationship between authors, countries, and institutions; the relationship of study

and subjects studied with each other; the structures of the concepts studied; and the network relations of particular authors and concepts. A total of 4029 studies published in selected years from 1975 to 2020 in 1313 different journals, books, etc. were analyzed. The distribution of the studies by years is shown in Figure 3.

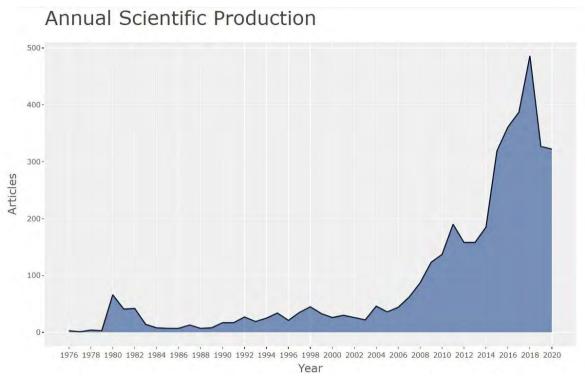


Figure 3. Annual Scientific Production

As shown in Figure 3, publications related to CE, civic education, and social studies in the WoS database increased yearly. According to the average of the entire chart, the increase rate of the publications is calculated as 11.21% and the highest publication number is observed in 2018 with 486 publications. From 1975 to 2003, the average number of annual publications is 21.4 and the number of publications remained relatively stable. From 2003 to 2020, two peak points are noteworthy. One of these is 2011 and the other is 2018. The total number of publications increased from 22 to 190 between 2003 and 2011 and reached to 486 in 2018. That is, in a 15–years period, the total number of annual publications in the WoS database is increased by almost 22 times. We are also witnessing a sharp decline in 2019 with 327 publications and a relatively soft one in 2020 with 322 publications.

#### **Top Ten Most Relevant Sources**

As presented in Table 2, the journal with the highest number of publications on CE and social studies is Theory and Research in Social Education (110), followed by Journal of Curriculum Studies (60) and Social Studies (58). Theory and Research in Social Education and Social Education as the top journals in the field are affiliated to National Council for the Social Studies (NCSS) in the USA. Considering the total number of articles published in both journals (n=153), it can be argued that these journals have a significant impact in the field in terms of publication.

Source Name	Р
Theory and Research in Social Education	110
Journal of Curriculum Studies	60
Social Studies	58
Proceedings of the Annual Civic Education Conference (ACEC 2018)	44
Social Education	43
Teaching and Teacher Education	43
Teachers College Record	34
Education Citizenship and Social Justice	33
Asia Pacific Journal of Education	28
Journal of Moral Education	28

Table 2. Top Ten Most Relevant Sources

#### Top Ten Most Influent Authors in Terms of Publications and Citations

The top ten authors regarding the number of publications per year and most cited authors were also examined in this study. As presented in Table 3, the author with the highest number of publications in the field is Kennedy (TP=21), followed by Vaughn (TP=18) and Davies (TP=16). Moreover, fractionalized frequency of publications was examined in order to determine the actual contributions of the most productive authors. This technique compares the published articles according to the number of authors in each article to determine the contribution of an individual author (Aria et al., 2020). Accordingly, considering the fractionalized frequency analysis of the authors and articles, while Kennedy (FP = 12.92) is in the first rank, followed by Waghid (FP = 11) and Torres (FP = 10.5). According to the citation numbers presented in Table 4, the most cited author is Zimmerman, Bandura and Martinez-Pons's (1992) self-efficacy study (TC=849), followed by Kahne (TC=818) and Westheimer (TC=657). When the research fields of these authors are examined it was revealed that they focused on self-efficacy (Zimmerman et al., 1992), educating the "good citizen" (Westheimer & Kahne, 2004), and political engagement in civic education (Galston, 2001).

Authors	ТР	FP	Authors	ТС	ACd
1. Kennedy, KJ	21	12.92	1. Bandura, A.	894	894
2. Vaughn, S	18	4.53	2. Martinezpons, M	894	894
3. Davies, I	16	8.54	3. Zimmerman, BJ	894	894
4. Sim, JBY	14	7.92	4. Kahne, J	818	116,86
5. Waghid, Y	14	11.00	5. Westheimer, J	657	657
6. Janmaat, JG	13	8.00	6. Galston, WA	615	205
7. Torney-Purta, J	13	6.17	7. Marks, HM	511	511
8. Wanzek, J	13	3.20	8. Banks, JA	493	61.6
9. Osler, A.	12	9.00	9. Osler, A.	389	32.42
10. Torres, CA	12	10.50	10. Vaughn, S	371	20.61

Table 3. Top Ten Most Influent Authors in Terms of Publications and Citations

*Note:* TP= publications, FP= fractionalized publications, TC= citations, ACd= average citations per document

Publication networks of the co-authorship are also examined as shown in Figure 4. The authors were also examined regarding the co-authorship. Co-authorship networks allow displaying the network between the collaborating authors and also provide an insight into the identification of leading authors in the field and the dynamics of academic knowledge production. Accordingly, co-authorship networks with the most powerful connections were also investigated in the study.

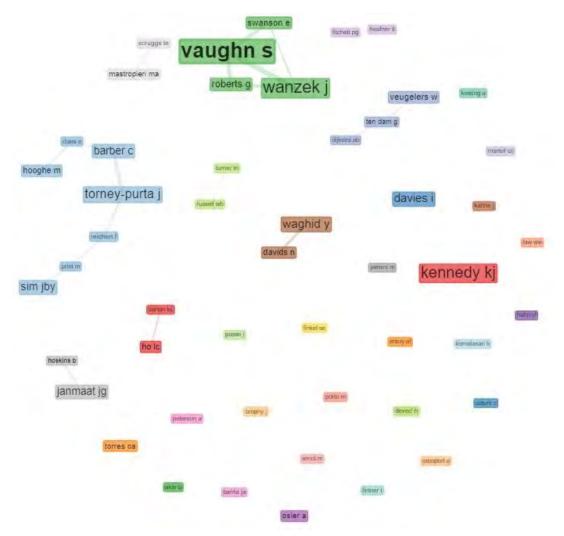


Figure 4. Co-authorship Network

In Figure 4, the lines between the authors refer to the collaboration between authors and the thickness of these lines implies the strength of the collaboration. Moreover, the size of the author's name is proportional with the number of publications of the author. As shown in Figure 4, the biggest collaboration is the network of 7 authors including Sim, Torney-Purta, Barber, Hooghe, Reichert, Claes and Print. The second network of 4 authors includes Vaughn, Wanzek, Swanson, and Roberts. Vaughn and Wanzek are also included in the top ten most influential authors. Both authors have interdisciplinary-related publications on reading comprehension and literacy fields. The third biggest collaboration is the network including the authors who are Ten Dam, Veugelers, and Dijkstra. These authors work at the same university that is the Graduate School of Child Development and Education of the University of Amsterdam in Holland and they carry out research on citizenship competences.

### Top Ten Most Important Countries in Terms of Publications and Citations

The country-based analysis of the number of publications on CE was also investigated and citations to these publications were compared. Accordingly, the country with the highest number of publications is USA, followed by UK and Turkey. As presented in Table 4, another remarkable statistic is that the number of publications of USA is higher than the total of ten countries; UK, Turkey, China, Spain, Canada, Indonesia, Australia, Netherlands, Germany, and South Africa.

SCR	Country	ТР	SCR	Country	ТС	ACd
1	USA	2332	1	USA	14000	9.569
2	UK	441	2	UK	3699	12.755
3	TURKEY	417	3	CANADA	1398	10.279
4	CHINA	271	4	CHINA	698	4.335
5	SPAIN	248	5	AUSTRALIA	657	7.141
6	CANADA	211	6	NETHERLANDS	417	6.516
7	INDONESIA	204	7	TURKEY	402	1.628
8	AUSTRALIA	150	8	SPAIN	318	1.975
9	NETHERLANDS	122	9	ISRAEL	257	6.425
10	GERMANY	92	10	SWEDEN	245	5.444

Table 4. Top Ten Most Important Countries in Terms of Publications and Citations

*Note:* SCR= ranking, TP= publications, TC= citations, ACd= average citations per document

Regarding the citation numbers, USA is in the first rank, followed by UK, Canada, China, and Australia. It is noteworthy that there are differences between the list of citation rankings and the list of the number of publications generated by countries. Accordingly, if the tables of the number of publications and citations compared, it can be argued that USA and UK have similar development in terms of both production and citation, that is, demand for this production. However, it can be stated that the publications of the Turkey and Spain, which are the third and fifth countries regarding the number of publications, received a less demand compared to the publications of the Canada and Australia. Another important finding is that the research field of CE and social studies is dominated by USA and UK in terms of both publications and citations.

#### Intra- and Inter-Country Collaboration among the Top Ten Productive Countries

According to the analysis of data, the top three countries with the highest number of publications were found as USA (1463), UK (290), and Turkey (247). As presented in Table 5, these countries are followed by China (161), Spain (161), and Indonesia (144). According to the Multiple Country Publications (MCP) ratings, USA (50), UK (44), and China (33) are in the top three ranks, additionally, while Turkey (2) is one of the top three countries regarding the number of publications, it has the lowest CCR rate among the first ten countries. Regarding the average CCR values of the countries, the top countries that open to collaboration are China (20.50% CCR), UK (15.17% CCR), and Australia (11.96% CCR). Moreover, it was revealed that some

countries such as Turkey (0.81% CCR), Indonesia (2.08% CCR), USA (3.42% CCR), and Spain (5.59% CCR) generally produced single country publications (SCP).

SCR	Country	Articles	Freq	SCP	МСР	CCR(%)
1	USA	1463	0.391491	1413	50	3.42
2	UK	290	0.077602	246	44	15.17
3	TURKEY	247	0.066096	245	2	0.81
4	CHINA	161	0.043083	128	33	20.50
5	SPAIN	161	0.043083	152	9	5.59
6	INDONESIA	144	0.038534	141	3	2.08
7	CANADA	136	0.036393	124	12	8.82
8	AUSTRALIA	92	0.024619	81	11	11.96
9	NETHERLANDS	64	0.017126	60	4	6.25
10	SOUTH AFRICA	53	0.014182	47	6	11.32

 Table 5. Intra- and Inter-Country Collaboration among the Top Ten Productive Countries

Note. SCP= single country publication, MCP= multiple countries publication, CCR= country collaboration rate

The publication network of the countries is shown in Figure 5.

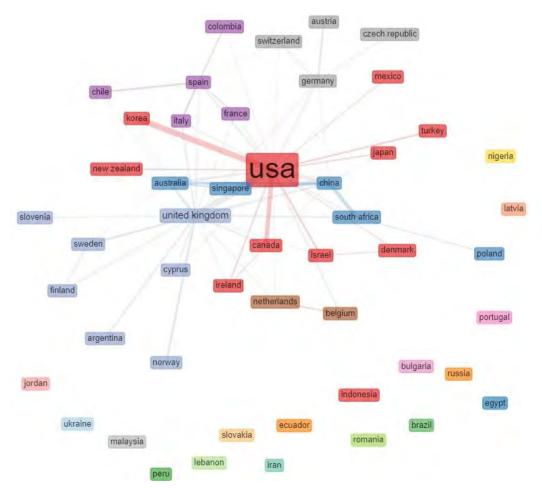


Figure 5. Country Collaboration Network

Regarding the country collaboration situations by country, USA and UK are located at the center and a network structure consists of 33 countries was determined. Considering the fact that the same colored countries are placed in the same cluster and the thickness of the lines between the countries refers to the intensity of the collaboration, the same ranking with the MCP was observed. In other words, USA, UK, and China are top three countries regarding the network structure. In addition, 17 countries were identified with their extensive inter-country publications.

### Top Ten Most Important Institutions in Terms of Publications

As presented in Table 6, the most prominent institutions regarding CE and social studies fields are the University of Texas, Indiana University, Nanyang Technology University. In the top five countries, apart from USA, only Singapore ranked third with Nanyang Technology University and China ranked fifth with Education University of Hong Kong. Six of the top 10 universities are from USA, the others from Singapore (1), China (1), UK (1), and Indonesia (1).

SCR	Institutions	ТР
ben	Institutions	11
1	The University of Texas at Austin	65
2	Indiana University	49
3	Nanyang Technological University	48
4	The University of North Carolina	48
5	The Education University of Hong Kong	44
6	University of Missouri	42
7	Universitetas Pendidikan Indonesia	39
8	Michigan State University	38
9	University of London	38
10	University of Washington	38

Table 6. Top Ten Most Important Institutions in Terms of Publications

The collaboration networks of the institutions regarding the publications are presented in Figure 6. Institutional collaboration networks were also examined in the present study. Accordingly, the institutions in USA were determined as the most diversely collaborating institutions. Regarding the whole picture of institutional collaborations, it was found that some networks were established within countries. According to the evaluation of the institutional networks, the biggest network consists of 10 different universities from 4 different countries; "University of Hong-Kong, Nanyang technology, Hong-Kong institute of education, Education University of Hong-Kong, University of Johannesburg, and University of Virginia." This network indicates that the University of Hong-Kong established collaborations with universities in Hong-Kong as well as in USA and Australia. The second biggest network consists of 5 different universities; one of them is University of Texas, which has the highest number of publications in this field, Arizona State University, Florida State University of Houston, and Purdue University. The third biggest network includes Michigan State

University, University of Michigan, Stanford University, and the University of Pennsylvania. Apart from these networks, no intense collaborations were determined except from binary networks such as University of Georgia with Indiana University; Marmara University with Anadolu University; University of York with University of Toronto.

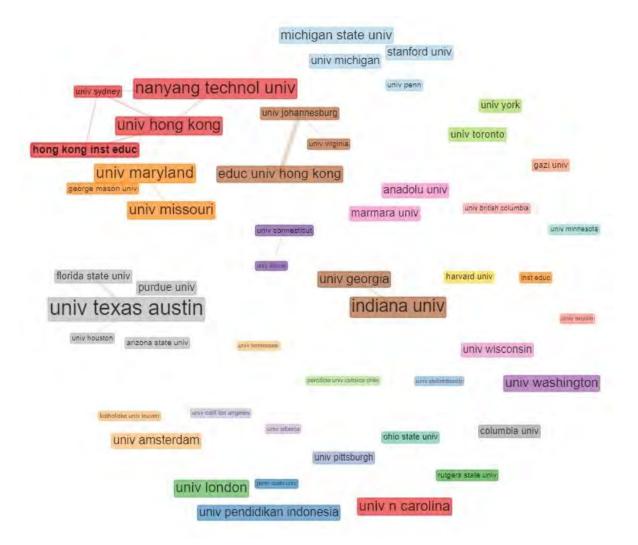


Figure 6. Institutional Collaboration Network

# **Top Ten Most Cited Publications**

As it is present in Table 7, according to the WoS database, the most cited publication in the field of social studies and CE is the study of Zimmerman, Bandura and Martinez-Pons (1992) with a total citation number of 894 and the average number of citations per year is 29.80. When it is examined, it is seen that the research was conducted in the scope of social studies course and it was explained why researchers selected social studies course for their research. So, we included this research in the dataset. The second most cited publication is carried out by Westheimer and Kahne (2004) with a total citation number of 657 and the average number of citations per year is 36.50. This study examined the term 'the good citizen' and the duties and responsibilities included in this concept. Moreover, Westheimer and Kahne's (2004) study is the most cited publication in terms

of the average number of citations per year (ACy:36.50). The third publication is carried out by Marks (2000) on student engagement with a total citation number of 511 and the average number of citations per year is 23.23. Moreover, an evaluation of the top ten most-cited publications revealed that nine of these studies were published in the years 2000–2010 and four of them were published in American Educational Research Journal.

SCR	Authors	Publication Title	Total	ACy
			Citations	v
1	Zimmerman, B.J.,	Self-Motivation for Academic Attainment: The	894	29.80
	Bandura, A. &	Role of Self-Efficacy Beliefs and Personal Goal		
	Martinez-Pons, M.	Setting		
	(1992)			
2	Westheimer, J. &	What Kind of Citizen? The Politics of Educating	657	36.50
	Kahne, J. (2004)	for Democracy		
3	Marks, H.M. (2000)	Student Engagement in Instructional Activity:	511	23.23
		Patterns in the Elementary, Middle, and High		
		School Years		
4	Galston, W.A.(2001)	Political Knowledge, Political Engagement, and	484	23.05
		Civic Education		
5	Banks, J.A. (2008)	Diversity, Group Identity, and Citizenship	344	24.58
		Education in a Global Age		
6	Macedo, S. (1995)	Liberal civic education and religious	204	7.55
		fundamentalism: The case of God v. John Rawls?		
7	Kahne, J. E. &	Developing Citizens: The Impact of Civic Learning	199	14.21
	College, M. (2008)	Opportunities on Students' Commitment to Civic		
		Participation		
8	Sadler, T.D., Barab,	What do students gain by engaging in	190	12.67
	S. A. & Scott, B.	socioscientific inquiry?		
	(2007)			
9	Hillygus, D.S.(2005)	The missing link: Exploring the relationship	180	10.59
		between higher education and political engagement		
10	Osler, A. & Starkey,	Learning for cosmopolitan citizenship: Theoretical	176	9.27
	Н. (2003)	debates and young people's experiences		

Table 7.	Top T	en Most	Cited	Publications
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*Note:* SCR= ranking, TP= publications, TC= citations, ACy= average citations per year

### **Top Ten Most Frequent Words and Co-Occurrence Network**

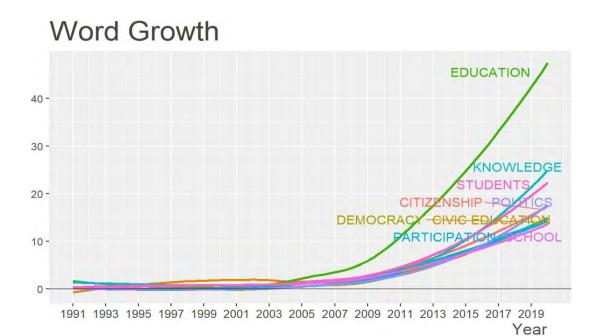
As indicated in Table 8, the most frequent word is education (n=319), followed by knowledge (149) and students (147). If the search words, civic education and citizenship, and the terms identifying the general partners such as school and students are excluded, identity (103), politics (98), participation (97), and

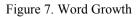
democracy (88) stand out. In addition to the analysis conducted, the correlation between the most frequent words and research subfields were examined through co-occurrence network analysis. Top ten most frequent words and the evolution of related concepts in time are shown in Figure 7.

Terms	Frequency	
Education	319	
Knowledge	149	
Students	147	
Citizenship	116	
Civic education	110	
Identity	103	
School	103	
Politics	98	
Participation	97	
Democracy	97	

Table 8. Top Ten Most Frequent Words

As it is shown in the Figure 7, the evolution of the top ten most frequent words is stable until 2005 and since then it has progressed in parallel with the two peaks in the number of publications. It was determined that the word "education" is by far the most frequently used word, followed by "knowledge", "students", "citizenship", and "civic education". If the terms examined in the current study and general stakeholders are ignored, the most frequent words will be identity, politics, participation, and democracy. The evolution of the words in time and their co-occurrence with different words in publications is displayed in the co-occurrence network shown Figure 8.





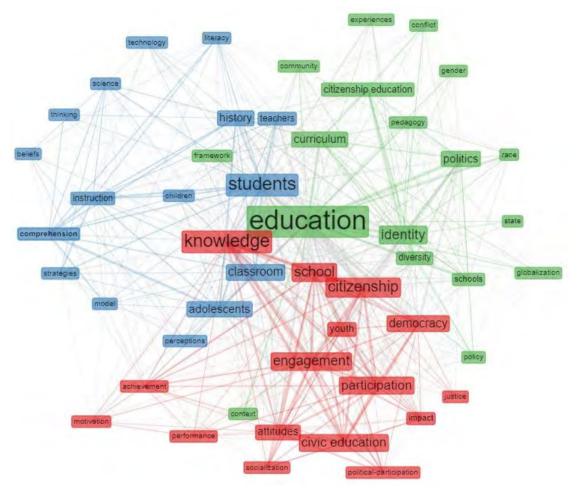


Figure 8. Co-occurrence Network

According to the co-occurrence network, terms are grouped in three different colors; blue, red, and green and connected with many edges. Moreover, the thickness of the lines between the edges implies the co-occurrence frequency of the terms. Accordingly, CE shown in the green network is generally used with the terms "education, identity, politics, curriculum, diversity, schools, race, policy, pedagogy, globalization, framework, context, experiences, state, gender, conflict, community". The term civic education shown in the red network is generally used with the terms, "knowledge, citizenship, school, participation, democracy, engagement, attitudes, youth, impact, achievement, political-participation, performance, socialization, motivation, justice". The term social studies shown in the blue network is used with the terms "students, history, classroom, adolescents, teachers, instruction, children, science, literacy, model, beliefs, comprehension, strategies, perceptions, technology, thinking". Finally, while CE is generally associated with the terms implying pluralism such as identity, democracy, globalization, race, politics, and conflict, civic education is generally associated with the terms related to social and political participation. The term social studies is mostly used with the dimension of education and interdisciplinary such as, reading comprehension, science, history.

# Discussion

The results obtained in the current study revealed that publications on CE increased constantly during the period

of 2003–2005 and increased dramatically starting from 2003. Similarly, a study carried out by Huang et al. (2020) demonstrated that studies on education displayed a dramatic increase after 2003. This growth trend is also same in other educational fields such as math education (Gökçe and Güner, 2021) and artificial intelligence in education (Talan, 2021). The main reason for this situation is the fact that increases in the number of electronic publications as a result of technological developments made in recent decades, increase in the number of researchers in the field of social studies education, and continuous increase in the number of journals and articles in the WoS database. Although the research on CE increased by 22 times in the past 15 years, the publications on education increased by 6.5 times in the same time period and it indicates that there are other reasons behind the increase in the number of studies on social studies education in recent years. As suggested by Cardis and Risinger (1994), some of these reasons include factors that directly affect CE such as rapid demographic changes, understanding change for teaching and learning, and the relations of countries with each other. Besides, as a result of the association of CE with various disciplines, especially after the second half of the 20th century, CE became a very suitable field for interdisciplinary studies. This transformation led researchers, who study in different fields, to publish CE related studies, in addition to the researchers who are experts in CE. Therefore, it can be said that the developments explained above played an important role in the rapid increase in the number of studies on CE.

The results obtained in the present study demonstrated that Theory and Research in Social Education is the journal in which the largest number of CE-related research is published. It is noteworthy that the number of studies published in Theory and Research in Social Education is far more than the number of publications in "Journal of Curriculum Studies", the second journal on the list. These two journals are followed by the "Social Studies". It is an attention-grabbing fact that the number of CE-related research published in the Journal of Curriculum is more than the journals focusing on subjects directly linked to CE such as "Social Education", "Education Citizenship and Social Justice", and "Journal of Moral Education".

The research findings include top ten researchers with the highest number of articles on CE and also the top ten most cited authors. It was determined that only 2 of the top ten authors with the highest number of articles took place in the list of the top ten most-cited authors. These results indicated that the authors with the highest number of publications on CE did not display the same performance in receiving citations. Moreover, it is noteworthy that while researchers from non-western countries took place among the top ten researchers with the highest number of articles, all the top ten most-cited authors are from western countries. Based on these results of the current study, it should be emphasized that universities or institutions located in western countries regarding the number of publications and citations as shown in Table 4. According to Table 4, 61.8% of the publications made by the top ten countries are belong to USA and UK, the first two countries in the list. Moreover, the top ten countries with most-cited authors were investigated and it was determined that USA, UK, Canada, and China are the first countries and the authors from these countries represent 89.61% of the total citations as displayed in Table 6, 7 of 10 institutions are located in Western countries. Considering the results obtained in

this study, the authors claim that Western countries dominate the academic studies in the field of CE. A similar situation was also reported in various studies for different research areas such as educational research (Huang et al., 2020), specifically STEM education (Li, Wang, Xiao and Froyd, 2020), distance education (Bagriacik Yilmaz and Banyard, 2020), science education (Chang, Chang and Tseng, 2010; Lin, Lin and Tsai, 2014), student engagement and educational technology in higher education (Bond et al., 2020), creative pedagogies (Cremin and Chappell, 2019), and character education (Pattaro, 2016).

The findings indicated that USA and UK took the top places regarding both SCP and MCP rankings. It is noteworthy that a non-Western country; China produced more publications than Canada and Australia in terms of MCP. The main reason here may be the fact that a large number of Chinese students prefer Western universities for graduate education to earn a masters or doctoral degree. The results also indicate that Western-countries, especially English-speaking countries represent a bigger portion of publications and citations as well as MCP. Based on the literature on studies related to MCP, our findings are concordant with those found in the studies carried out by Ortega and Aguillo (2013) and Gui, Liu and Du (2018). It is suggested that the reason for English-speaking countries is very influential in this field is because English is the universal language of science and this leads universities more connected to the world and open to collaboration. Moreover, the fact that both the world's top authors with the highest number of publications and the most cited authors are from Western countries, makes multi-country-collaboration with researchers from western-countries more attractive for authors from non-Western countries.

It was found that among the top ten institutions with the highest number of publications, 6 institutions from USA, 1 from UK, 1 from Singapore, 1 from China, and 1 from Indonesia. There are some similarities and differences between this finding and results obtained in the studies conducted by Chapin (1974), Hepburn and Dahler (1983), and Wrubel and Ratliff (1978). For example, similar to our findings, Indiana University and the University of Texas at Austin are two of the institutions with the highest number of dissertations on social studies education in USA in the 1960s–70s. On the other hand, unlike our findings, it is attention-grabbing that the Stanford University, Ohio State University, and Columbia University, which are the among top ten institutions with the highest number of dissertations on social studies education in the 1960s–70s, are not placed in top ten institutions on publication productivity today.

Our findings indicate that the most cited publication is "Self-Motivation for Academic Attainment: The Role of Self-Efficacy Beliefs and Personal Goal Setting" conducted by Zimmerman, Bandura and Martinez-Pons (1992). In other words, this research was determined as the most used source by researchers in this field. Remarkably, the most cited publication is related to self-efficacy, a more related study with social psychology compared to CE. The remaining most cited 9 publications are related to social studies, CE, and civic education.

It was found that studies on CE usually include subtopics of education, knowledge, students, citizenship, civic education, identity, school, politics, participation, democracy. In this regard, our findings show some similarities and also some differences to conclusions by Osler and Starkey (2006). Different our findings, Osler and Starkey (2006) stated that studies on CE published in the years 1995–2005 included subtopics of unity, globalization,

cosmopolitanism, community, and leadership in addition to those found in our study. Moreover, our findings indicate that the social studies field usually includes subtopics related to teaching and interdisciplinary teaching dimensions such as instruction, literacy, reading comprehension, science, history, and strategies. These results matched with the subtopics included in the dissertations on social studies education in USA, Canada, and Turkey (Canbulat et al., 2016; Chapin, 1974; Hepburn & Dahler, 1983; Tarman et al., 2010; Tarman et al., 2011, Wrubel & Rafliff, 1978). Unlike our findings, in the dissertations on social studies education carried out in the above-mentioned countries, highly investigated topics are social studies curriculum, teaching and learning methods, teacher education, and measurement and evaluation. Multicultural education, economics education, value and moral education, and American history are the topics usually studied in USA different than those studied in other countries. On the other hand, learning styles, critical thinking, and student success are the topics usually studied in Turkey different than those studied in other countries.

Our findings indicate that studies related to civic education represent a large proportion of the CE literature from 1975 to 2011. Moreover, especially in the years 2004–2011, identity, citizenship, classroom, and school themes are seen in the CE literature. Similar to our findings, the results of the study carried out by Quaynor (2012) revealed that many studies related to CE conducted in different regions of the world are associated with classroom, school, and identity topics. This result display similarity with the study conducted by Osler and Starkey (2006). They found that in the studies related to CE cover topics such as global, cosmopolitan, and European citizenship as well as classroom practices and democratic schooling are stood out. However, unlike our findings, Osler and Starkey (2006) stated that diversity and unity, cross-cultural learning, curriculum policy, teacher perspectives, and leadership themes also included in the studies related to CE published from 1995 to 2005. This situation in the CE literature is also influenced by political developments in the world. As mentioned before, supranational and intergovernmental both regional and global organizations opened up new dimensions to the term citizenship and resulted in the emergence of different concepts of citizenship such as regional, global, and cosmopolitan citizenship. Identity is an indispensable part of citizenship and became a widely discussed topic in recent decades. Therefore, the concept of identity that is being questioned and discussions on how to guide students to develop an understanding regarding the concept of citizenship at classrooms and schools are also increased and these themes emerged in the CE literature.

This research had several limitations due to the nature of the bibliometric approach. Our findings are based on a limited number of publications obtained only from the WoS database. Therefore, many valuable studies published before 1975 are not included in our research. Moreover, the analyzed studies were obtained using only "citizenship education", "social studies", and "civic education" keywords from the WoS database. Nevertheless, our study provides significant insights regarding the trends and what developments took place in recent years.

### Conclusion

In this study, we aimed to review CE literature through bibliometric analysis. Results indicate that publications related to CE in the WoS database increased yearly. It was concluded that Theory and Research in Social

Education is the top journal that includes the most publications about CE. The study results also revealed that Kerry J Kennedy is the most influential researcher in terms of publication production in the literature.

Based on the country-based analysis of the number of publications on CE, it was concluded that the research field of CE is dominated by USA and UK in terms of both publications and citations. Furthermore, it was found that the University of Texas, Indiana University, and Nanyang Technology University were determined the most prominent institutions in terms of the total number of publications that are screened in the WoS database. Moreover, the institutions in USA were determined as the most diversely collaborating institutions.

Besides all, it was concluded that the research named "Self-Motivation for Academic Attainment: The Role of Self-Efficacy Beliefs and Personal Goal Setting" conducted by Zimmerman, Bandura, and Martinez-Ponz in 1992 is the most cited publication in the research field. It was also revealed that "identity", "politics", "participation" and "democracy" are found as the most important words in the field.

# References

- Aria, M., & Cuccurullo, C. (2017). Bibliometrix: An R-tool for comprehensive science mapping mapping analysis. *Journal of Informetrics*, 11(4), 959–975. https://doi.org/10.1016/j.joi.2017.08.007
- Aria, M., Misuraca, M., & Spano, M. (2020). Mapping the evolution of social research and data science on 30 years of social indicators research. *Social Indicators Research*, 1–29. https://doi.org/10.1007/s11205-020-02281-3
- Bagriacik Y., & Banyard, P. (2020). Engagement in distance education settings: A trend analysis. *Turkish* Online Journal of Distance Education, 21(1), 101–120. https://doi.org/10.17718/tojde.690362
- Banks, J. A. (2008). An introduction to multicultural education. New York, NY: Pearson.
- Banks, J. A. (2001). Citizenship education and diversity: Implications for teacher education. *Journal of Teacher Education*, 52(1), 5–16. https://doi.org/10.1177/0022487101052001002
- Beck, D., & Eno, J. (2012). Signature pedagogy: A literature review of social studies and technology research. *Computers in School*, 29(1–2), 70–94. https://doi.org/10.1080/07380569.2012.658347
- Berson, M. J. (2014). Effectiveness of computer technology in the social studies: A review of the literature. *Journal of Research on Computing in Education*, 28(4), 486–499. https://doi.org/10.1080/08886504.1996.10782179
- Bond, M., Buntins, K., Bedenlier, S., Zawacki-Richter, O., & Kerres, M. (2020). Mapping research in student engagement and educational technology in higher education: A systematic evidence map. *International Journal of Educational Technology in Higher Education*, 17(1), 1–30. https://doi.org/10.1186/s41239-019-0176-8
- Callon, M., Courtial, J. P., Turner, W. A., & Bauin, S. (1983). From translations to problematic networks: An introduction to co-word analysis. *Social Science Information*, *22*(2), 191–235.
- Canbulat, T., Avcı, G., & Sipahi, S. (2016). The Evaluation of the theses in the field of social studies in the U.S.A and Canada. *Kırsehir Faculty of Education Journal*, *17*(2), 351–370.

- Cardis, R. J., & Risinger, C. F. (1994). Contemporary trends in social studies. Social Studies and the Young Learner, 57(2), 4–22.
- Chang, Y. H., Chang, C. Y., & Tseng, Y. H. (2010). Trends of science education research: An automatic content analysis. *Journal of Science Education and Technology*, 19(4), 315–331. https://doi.org/10.1007/s10956-009-9202-2
- Chapin, J. R. (1974). Social studies dissertations: 1969–1973. Retrieved from https://files.eric.ed.gov/fulltext/ED098085.pdf
- Chen, C. (2006). CiteSpace II: Detecting and visualizing emerging trends and transient patterns inscientific literature. *Journal of the American Society for Information Science and Technology*, *57*(3), 359–377.
- Chen, C. (2017). Science mapping: Systematic review of the literature. *Journal of Data and Information Science*, 2(2), 1–40. https://doi.org/10.1515/jdis-2017-0006
- Cobo, M.J., Lopez Herrera, A.G., Herrera Viedma, E., & Herrera, F. (2011). Science mapping software tools: review, analysis and cooperative study among tools. *Journal of the American Society for Information Science*. 62(7), 1382–1402. https://doi.org/10.1002/asi.21525
- Cohen, A. (2019). Israel's civic education wars: A review of the literature and theoretical implications. *Educational Review*, 71(3), 287–305. https://doi.org/10.1080/00131911.2017.1407295
- Cremin, T., & Chappell, K. (2019). Creative pedagogies: a systematic review. *Research Papers in Education*, 1–33. https://doi.org/10.1080/02671522.2019.1677757
- Crick, R. D. (2005). Citizenship education and the provision of schooling: A systematic review of evidence. International Journal of Citizenship and Teacher Education, 1(2), 56–75.
- Cristol, D., Michell, R., & Gimbert, B. (2010). Citizenship education: A historical perspective (1951–Present). *Action in Teacher Education*, 32(4), 61–69. https://doi.org/10.1080/01626620.2010.549725
- Crocco, M. S. (2001). The missing discourse about gender and sexuality in the social studies. *Theory and Practice*, 40(1), 65–71.
- Diodato, V. P., & Gellatly, P. (2013). Dictionary of bibliometrics. New York, NY: Routledge.
- Doolittle, P. E., & Hicks, D. (2003). Consructivism as a theoretical foundation for the use of technology in social studies. *Theory & Research in Social Education*, 31(1), 72–104.
- Eryılmaz, Ö., Bozkurt, M. & Boyraz, C. (2021). Mapping research on social studies education in Turkey: A bibliometric review. *International Journal of Contemporary Educational Research*, 8(3), 191-205. DOI: https://doi.org/10.33200/ijcer.881165.
- Estellés, M., & Fischman, G. E. (2020). Who needs global citizenship education? A review of the literature on teacher education. *Journal of Teacher Education*, 1–14. https://doi.org/10.1177/0022487120920254
- Falagas, M. E., Pitsouni, E. I., Malietzis, G. A., & Pappas, G. (2008). Comparison of PubMed, Scopus, Web of Science, and Google Scholar: Strengths and weaknesses. *The FASEB Journal*, 22(2), 338–342.
- Fitzpatrick, D. (2018). Meta-analytic evidence for year-round education's effect on science and social studies achievement. *Middle Grades Research Journal*, *12*(1), 1–8.
- Garces, V.H. (2020). Alphabetize in school coexistence and citizenship. A documentary review of the civic education for the resolution of violence and sociocultural conflict. *Sophia-Education*, 16(1), 4–18. https://doi.org/10.18634/sophiaj.16v.1i.874.

- Garfield, E. (1994). Scientography: Mapping the tracks of science. *Current Contents: Social and Behavioural* Sciences, 7, 5–10.
- Garwood, J. D., McKenna, J. W., Roberts, G. J., Ciullo, S., & Shin, M. (2019). Social studies content knowledge interventions for students with emotional and behavioral disorders: A meta-analysis. *Behaviour Modification*, 1–30. https://doi.org/10.1177/0145445519834622
- Geobers, E., Geijsel, F., Admiraal, W., & ten Dam, G. (2013). Review of the effects of citizenship education. *Educational Research Review*, 9, 158–173. https://doi.org/10.1016/j.edurev.2012.02.001
- Goren, H., & Yemini, M. (2017). Global citizenship education redefined–A systematic review of empirical studies on global citizenship education. *International Journal of Educational Research*, 82, 170–183. https://doi.org/10.1016/j.ijer.2017.02.004
- Gokce, S. & Guner, P. (2021). Forty years of mathematics education: 1980-2019. International Journal of Education in Mathematics, Science, and Technology (IJEMST), 9(3), 514-539. https://doi.org/10.46328/ijemst.1361.
- Graham, S., Kiuhara, S.A., & MacKay, M. (2020). The effects of writing on learning in science, social studies and mathemates: A meta-analysis. *Review of Educational Research*, 90(2), 179–226. https://doi.org/10.3102/0034654320914744
- Gui, Q., Liu, C., & Du, D. (2018). International knowledge flows and the role of proximity. *Growth and Change*, 49(3), 532–547. https://doi.org/10.1111/grow.12245
- Gürdoğan Bayır, Ö., & Bozkurt, M. (2018). Effectiveness of cooperative learning approaches used in the course of social studies in Turkey: A meta-analysis study. *European Journal of Education Studies*, 4(10), 171– 192. https://doi.org/10.5281/zenodo.1313863
- Hallinger, P., & Kovačević, J. (2019). A bibliometric review of research on educational administration: Science mapping the literature, 1960 to 2018. *Review of Educational Research*, 89(3), 335–369. https://doi.org/10.3102/0034654319830380
- He, Q. (1999). Knowledge discovery through co-word analysis. Library Trends, 48(1), 133–159.
- Heater, D. (2001). The history of citizenship education in England. Curriculum Journal, 12(1), 103-123.
- Hébert, Y., & Sears, A. (2001). *Citizenship education*. Toronto, Canada: Canada Education Association. https://doi.org/10.1.1.474.5446&rep=rep1&type=pdf.
- Hepburn, M. A (1999). Media literacy: A must for middle school social studies. *The Clearing House*, 72(6), 652–356.
- Hepburn, M. A., & Dahler, A. (1983). Social studies dissertations: 1977–1982. Retrieved from https://ia802705.us.archive.org/29/items/ERIC\_ED245970/
- Horey, D., Fortune, T., Nicolacopoulos, T., Kashima, E., & Mathisen, B. (2018). Global citizenship and higher education: A scoping review of the empirical evidence. *Journal of Studies in International Education*, 22(5), 472–492. https://doi.org/10.1177/1028315318786443
- Huang, C., Yang, C., Wang,S., Wu, W., Su, J., & Liang, C. (2020) Evolution of topics in education research: a systematic review using bibliometric analysis, *Educational Review*, 72(3), 281–297. https://doi.org/10.1080/00131911.2019.1566212
- Hubert, J. J. (1980). Linguistic indicators. Social Indicators Research, 8(2), 223-255.

- Johnson, L., & Morris, P. (2010). Towards a framework for critical citizenship education. The *Curriculum Journal*, 21(1), 77–96. https://doi.org/10.1080/09585170903560444
- Johnson, L., & Morris, P. (2012). Critical citizenship education in England and France: A comparative analysis. *Comparative education*, 48(3), 283–301. https://doi.org/10.1080/03050068.2011.588885
- Karasözen, B., Bayram, Ö. G., & Zan, B. U. (2011). Comparison of WoS and Scopus databases, *Türk Kütüphaneciliği*, 25(2). 238–260.
- Keating, A. (2014). Education for citizenship in Europe: European policies, national adaptations and young people's attitudes. London, UK: Palgrave MacMillan.
- Keating, A., Ortloff, D. H., & Philippou, S. (2009). Introduction: Citizenship education curricula: The changes and challenges presented by global and European integration. *Journal of Curriculum Studies*, 41(2), 145– 158. https://doi.org/10.1080/00220270802485063
- Kymlicka, W. (2011). Multicultural citizenship within multination states. *Ethnicities*, 11(3), 281-302.
- Li, Y., Wang, K., Xiao, Y., & Froyd, J. E. (2020). Research and trends in STEM education: a systematic review of journal publications. *International Journal of STEM Education*, 7(11), 1–16. https://doi.org/10.1186/s40594-020-00207-6
- Lin, A. (2015). Citizenship education in American schools and its role in developing civic engagement: A review of the research. *Educational Review*, 67(1), 35–63. https://doi.org/10.1080/00131911.2013.813440
- Lin, T. C., Lin, T. J., & Tsai, C. C. (2014). Research trends in science education from 2008 to 2012: A systematic content analysis of publications in selected journals. *International Journal of Science Education*, 36(8), 1346–1372. https://doi.org/10.1080/09500693.2013.864428
- Marshakova, I. V. (1981). Citation networks in information science. Scientometrics, 3(1), 13-26.
- Moher, D., Liberati, A., Tetzlaff, J., & Altman. D. G. (2009). Preferred reporting items for systematic reviews and meta-analyses: The PRISMA statement. *Annals of Internal Medicine*, *151*(4): 264–269.
- Manning, N., & Edwards, K. (2014) Does civic education for young people increase political participation? A systematic review, *Educational Review*, 66(1), 22–45. https://doi.org/10.1080/00131911.2013.763767
- Noyons, E. C. M., & Van Raan, A. F. J. (1998). Advanced mapping of science and technology. *Scientometrics*, 41(1-2), 61-67.
- Oguz Hacat, S., & Demir, F. B. (2018). Evaluation of the doctoral dissertations conducted on social studies education (2002–2018). *International Journal of Euroasian Researches*, 6(15), 948–973. https://doi.org/10.33692/avrasyad.510136
- Ortega, J. L., & Aguillo, I. F. (2013). Institutional and country collaboration in an online service of scientific profiles: Google scholar citations. *Journal of Informetrics*, 7(2), 394–403. https://doi.org/10.1016/j.joi.2012.12.007
- Osler, A., & Starkey, H. (2003). Learning for cosmopolitan citizenship: Theoretical debates and young people's experiences, *Educational Review*, 55(3), 243–254. https://doi.org/10.1080/0013191032000118901
- Osler, A., & Starkey, H. (2006). Education for democratic citizenship: A review of research, policy and practice 1995–2005. *Research Papers in Education*, 21(4), 433–466. https://doi.org/10.1080/02671520600942438

- Osler, A., & Starkey, H. (2018). Extending the theory and practice of education for cosmopolitan citizenship. *Educational Review*, 70(1), 31–40. https://doi.org/10.1080/00131911.2018.1388616
- Vaughn, S., Swanson, E. A., Roberts, G., Wanzek, J., Stillman- Spisak, S. J., Solis, M., & Simmons, D. (2013). Improving reading comprehension and social studies knowledge in middle school. *Reading Research Quarterly*, 48(1), 77–93.
- Öner, G., & Öner, D. (2017). An analysis and bibliography study of graduate theses written on geography subjects in social studies education. *Boğaziçi University Journal of Education*, *34*(2), 13–34.
- Öztürk, C., & Deveci, H. (2016). Evaluation of social studies curriculums of different countries. C. Öztürk (Eds.). In *Evaluation of social studies curriculums of different countries* (pp. 1–40). Ankara, Turkey: Pegem Akademi.
- Parker, W. C. (1996). "Advanced" ideas about democracy: Toward a pluralistic conception of citizen education. *Teachers College Record*, 98(1), 105–25.
- Parker, W.C. (2008) Knowing and doing in democratic citizenship education. In L. S. Levstik & C. A. Tyson (Eds.). *Handbook of research in social studies education* (pp.65–80). Newyork: Routledge.
- Pashby, K., da Costa, M., Stein, S., & Andreotti, V. (2020). A meta-review of typologies of global citizenship education. *Comparative Education*, 56(2), 144–164. https://doi.org/10.1080/03050068.2020.1723352
- Pattaro, C. (2016). Character education: Themes and researches. An academic literature review. *Italian Journal* of Sociology of Education, 8(1), 6–30.
- Persson, O., Danell, R., & Schneider, J.W. (2009). How to use Bibexcel for various types of bibliometric analysis. In F. Astrom, R. Danell, B. Larsen & J.W. Schneider (Eds), *Celebrating scholarly communication studies: A Festschrift for Olle Persson at his 60th Birthday*. Leuven: International Society for Scientometrics and Informetrics, 5, pp. 9-24. Retrieved from https://portal.research.lu.se/ws/files/5902071/1458992.pdf.
- Quaynor, L. J. (2012). Citizenship education in post-conflict contexts: A review of the literature. *Education, Citizenship and Social Justice*, 7(1), 33–57. https://doi.org/10.1177/1746197911432593
- Roemer, R.C., & Borchart, R. (2015). *Meaningful metrics: A 21st-century librarian's guide to bibliometrics, altmetrics, and research impact.* Chicago, IL: Association of College and Research Libraries.
- Sci2 Team. (2009). Science of Science (Sci2) Tool. Indiana University and SciTech Strategies. Retrieved from https://sci2.cns.iu.edu
- Sears, A. (1994). Social studies as citizenship education in English Canada: A review of research. *Theory & Research in Social Education*, 22(1), 6–43.
- Sen, A. (2019). Changes and continuities in citizenship education: what kind of citizenship education does the 2018 social studies programme of study envisage. *Journal of Qualitative Research in Education*, 7(1), 1– 28. https://doi.org/10.14689/issn.2148-2624.1.7c1s.1m
- Sim, J.B.E., & Print, M. (2005). Citizenship education and social studies in Singapore: A national agenda. International Journal of Citizenship and Teacher Education, 1(1), 58–73.
- Small, H. (1973). Co-citation in the scientific literature: A new measure of the relationship between two documents. *Journal of the Association for Information Science and Technology*, 24(4), 265–269.
- Small, H. (1999). Visualizing science by citation mapping. Journal of the American Society for Information Science, 50(9), 799–813.

- Swanson, E., Hairrell, A., Kent, S., Ciullo, S., Wanzek, J.A., & Vaughn, S. (2014). A synthesis and metaanalysis of reading interventions using social studies content for students with learning disabilities. *Journal of Learning Disabilities*, 47(2), 178–195. https://doi.org/10.1177/0022219412451131
- Sahin, M., Gögebakan Yıldız, D., & Duman, R. (2011). An evaluation of the theses on social studies education in Turkey. *Journal of Social Studies Education Research*, 2(2), 96–121.
- Tannebaum, R. P. (2015). Preservice social studies teachers' perspectives and understandings of teaching in the twenty-first century classroom: A meta-ethnography. *Journal of Social Studies Education Research*, 6(2), 154–176.
- Tarman, B., Acun, I., & Yüksel, Z. (2010). Evaluation of theses in the field of social studies education in Turkey. Gaziantep University Journal of Social Sciences, 9(3), 725–746.
- Torney-Purta, J., Lehmann, R., Oswald, H., & Schulz, W. (2001). Citizenship and education in twenty-eight countries: Civic knowledge and engagement at age fourteen. IEA Secretariat, Herengracht 487, 1017 BT, Amsterdam, The Netherlands.
- Torney-Purta, J., Schwille, J., & Amadeo, J. A. (1999). Civic education across countries: Twenty-four national case studies from the IEA civic education project. IEA Secretariat, Herengracht 487, 1017 BT, Amsterdam, The Netherlands.
- Trivers, H., & Starkey, H. (2012). The politics of critical citizenship education: Human Rights for Conformity or Emancipation?. In R. C. Mitchell & S. A. Moore (Eds.) *Politics, Participation & Power Relations* (pp. 137–151). Brill Sense.
- Uygun, K. (2020). Examination of the academic dissertations related to the problems encountered in social studies teaching: meta-synthesis study. *International Journal of Psychology and Educational Studies*, 7(1), 135–147. https://doi.org/10.17220/ijpes.2020.01.013
- Van Eck, N.J., & Waltman, L. (2010). Software survey: VOSviewer, a computer program for bibliometric mapping. *Scientometrics*, 84(2), 523–538. https://doi.org/10.1007/s11192-009-0146-3
- Van Eck, N. J., & Waltman, L. (2014). CitNetExplorer: A new software tool for analyzing and visualizing citation networks. *Journal of Informetrics*, 8(4), 802–823. https://doi.org/10.1016/j.joi.2014.07.006
- Van Meter, K. M., Cibois, P., & de Saint, L. M. (2004). Correspondence and co-word analysis of ten years of BMS articles (1993–2003). Bulletin de méthodologie sociologique, 84, 48–65.
- Veugelers, W., & de Groot, I. (2019). Theory and Practice of Citizenship education. In W. Veugelers (Ed.) Education for Democratic Intercultural Citizenship (pp. 14–41). Leiden, NL: Brill Sense.
- Waghid, Y. (2005). Action as an educational virtue: Toward a different understanding of democratic citizenship education. *Educational theory*, *55*(3), 323–342.
- Whitworth, S. A., & Berson, M. J. (2002). Computer technology in the social studies: An examination of the effectiveness literature (1996–2001). *Contemporary Issues in Technology and Teacher Education*, 2(4), 471–508.
- Wrubel, P. R., & Ratliff, R. (1978). Social studies dissertations: 1973–1976. Retrieved from https://ia803009.us.archive.org/5/items/ERIC\_ED164361/ERIC\_ED164361.pdf
- Yasar, Cengelci Köse, T., Göz, N.L., & Gürdogan Bayır, Ö. (2015). The effectiveness of student-centered teaching-learning processes in the social studies: A meta-analysis study. *Anadolu Journal of Educational Sciences International*, 5(1), 38–56.

- Yemini, M., Tibbitts, F., & Goren, H. (2019). Trends and caveats: Review of literature on global citizenship education in teacher training. *Teaching and Teacher Education: An International Journal of Research* and Studies, 77(1), 77–89.
- Yoder, P. J., Kibler, A., & van Hover, S. (2016). Instruction for english language learners in the social studies classroom: A meta-synthesis. *Social Studies Research and Practice*, *11*(1), 20–39.
- Yukhymenko, M. (2011). Students' interest in social studies and negotiation self-efficacy: A meta-analysis of the globaled project. *Journal of Technology and Teacher Education*, 19(3), 369–392.
- Zimmerman, B. J., Bandura, A., & Martinez-Pons, M. (1992). Self-motivation for academic attainment: The role of self-efficacy beliefs and personal goal setting. *American Educational Research Journal*, 29(3), 663–676.
- Zupic, I., & Cater, T. (2015). Bibliometric methods in management and organization, Organizational Research Methods, 18(3). 429–472. https://doi.org/10.1177/1094428114562629

Author Information				
Mahmut Bozkurt	Önder Eryılmaz			
b https://orcid.org/0000-0002-3169-6819	bttps://orcid.org/0000-0002-4962-889X			
Sinop University	Amasya University			
Faculty of Education, Sinop	Faculty of Education, Amasya			
Turkey	Turkey			
	Contact e-mail: onder.eryilmaz@amasya.edu.tr			
Celal Boyraz				
b https://orcid.org/0000-0001-5668-5051				
Bayburt University				
Faculty of Education, Bayburt				
Turkey				