Mapping Citations and Conceptual Terms Central to the Study of Organizing and Democracy

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Abstract

How can political science researchers use citation mapping tools to refine the development of research on complex theoretical concepts? While citation mapping is commonly used in the natural sciences and in some fields of social science, this powerful research tool is not yet commonly used in political science. In this study we argue for the usefulness of citation mapping for investigating complex theoretical topics in political science, and provide an illustrative example by using several methods to develop citation maps of the term "organizing" in relation to democratic processes and structures. The study begins by providing a brief review of the term "organizing" in the social science literature to contextualize the importance of contemporary scholarship on this topic, and to clarify the challenges of conducting citation mapping for complex theoretical concepts that can be described using a variety of linguistic terms. We then detail the multi-step methodological approach we implement to obtain the citation maps presented in the study, including a co-citation map of frequently cited references, and a co-occurrence map of conceptual terms that appear in keyword fields of studies on organizing. We conclude by reflecting on the theoretical and substantive insights yielded for the study of the concept of organizing by conducting citation mapping, and the implications for applying these tools to advance research on complex theoretical concepts in political science.[2]

Introduction

Democratic institutions and values are increasingly being challenged throughout advanced democracies (Bermeo 2016; Graham and Solvik 2020; Kaufman and Haggard 2018; Scheppele 2018). In this era of concern for democratic erosion, understanding how citizens can work together to achieve common goals and affect policies is of utmost importance. This urgent issue has provided the impetus for a series of recent studies on the ability of collective action to advance pro-democratic outcomes on individual, organizational and societal levels (Amenta and Polletta 2019; Han et al. 2021; Leighley and Oser 2018; Meyer 2021). However, while social scientists have extensively researched some forms of collective action, such as protest and social movements, one form of collective action that has received less scholarly attention is that of organizing.

Organizing has been defined in several ways in academic literature, and scholars have chosen to emphasize different aspects of the organizing tradition and practice. Woodly (2021) and Han (2014) distinguished the organizing approach to collective action as one in which the goal is not to mobilize a passive mass of people to support pre-defined political or policy ends, but to transform individuals – to change people's capacity and willingness to become agents of change. This approach has also been described as relational organizing (Ganz 2004; Han 2014; Warren 2001) – where "conversation and relationship building" (Warren 2001, 31) are key to defining the goals, strategies, and tactics of political action. Similarly, McAlevey (2016) emphasized that organizing purports to draw ordinary people with little to no experience in activism into becoming central participants in analysis and strategizing processes. Other scholars have referred to this process as leadership development (Ganz 2004; 2009; Han et al. 2011; Warren 2001), which "includes skills building… but encompasses the broader arts of political leadership, like

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relationship building, negotiation, and compromise" (Warren 2001, 31). Additionally, scholars have emphasized leadership quality as central to the success of organizing initiatives (Ganz 2009; Han et al. 2011; Morris 1986). Ganz (2009, 8) conceptualized this aspect as leaders' strategic capacity - their ability to make "informed, creative and responsive" strategic choices that are able "to take advantage of moments of unique opportunity." Whichever aspect scholars choose to emphasize, there is a general consensus that organizing is vital for democracy because it facilitates the ability of the citizenry to articulate and assert its interests (Ganz 2004), transfers power from the elite to the majority (McAlevey 2016), and makes people aware of the power and responsibility they hold as members of a democratic polity (Woodly 2021).

Organizing is important to study as a distinct form of collective action because it has different terms of possibility and requires different skills and orientations than other forms of collective action. Moreover, as some scholars argue, it may prove to have more significant or more long-term impact on individuals, groups, and entire societies (Han and Arora 2022; Han et al. 2021; Levi 2003; McAlevey 2016; Woodly 2021). Nevertheless, organizing initiatives face pitfalls and challenges that may hinder their success, such as competition between groups (Petitjean and Talpin 2022) and lack of strategic capacity among the leadership (Ganz 2009).

Given organizing's transformative potential and importance for democracy at this important juncture, we pull together the knowledge accumulated on organizing in academic research and review how organizing has been conceptualized and understood thus far in the social sciences. We do so by using scientific mapping methods to capture the scope, disciplinary distribution, main themes, foundational theories, and key characteristics of the literature on organizing. The maps presented in this study demonstrate that although the study of organizing is spread throughout multiple disciplines and involves a relatively dispersed and disconnected array

of scholars, it is nevertheless characterized by a cohesive and closely connected group of thematic interests. Moreover, we show that the literature on organizing is composed of distinct research streams that build upon a clear set of thematically distinguishable foundational theories.

Additionally, this article provides an illustrative example of how the theoretical and conceptual insights derived from citation maps can advance research on important concepts in political science and social science more generally. Specifically, we identify key questions about the literature on organizing to inform future theoretical conceptualization work. These questions are designed to move forward the research of organizing as a distinct practice, and to support our understanding of its potential contribution to strengthening democratic proclivities at a time of increasing political instability and strife.

Citation Mapping in the Social Sciences

Visually mapping fields of research is a powerful tool to grasp the academic landscape of a particular field at a larger scope than that which traditional literature reviews permit. Scientific mapping also allows researchers to draw insights regarding the characteristics of that landscape which are otherwise impossible to reach, and to base these insights on comprehensive quantitative data rather than on limited familiarity with the literature.

Citation mapping tools have been applied extensively by scholars of the natural sciences (Goncalves et al. 2019; Pauna et al. 2019; Yeung et al. 2019). However, citation mapping is not yet widely used in the social sciences, despite its capacity to produce data-driven insights about distinctive research fields. Recent studies that have used citation mapping in the social sciences have made significant contributions to clarifying conceptual boundaries and advancing research on specific topics.

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For example, authors have delineated existing approaches to studying a particular field, and proposed to generate a holistic approach that integrates the approaches they had identified in the literature. This approach is used in Adro and Fernandes's (2022) investigation of research on social entrepreneurship which used citation mapping to identify three approaches for understanding the relationship between entrepreneurship and the third sector, and to offer a new holistic approach that builds on the strengths of the approaches they had identified.

Others have used citation mapping to delineate different types of a social phenomenon, identify which types have received less scholarly attention, and call for further research on these types. For example, Park et al.'s (2020) study of "fake news" identifies four sub-types of fake news differentiated by variations in the intention to deceive and/or cause harm. They further show that scholarship has focused on two of the four sub-types, thus leading the authors to call for more research on the two understudied sub-types.

Still others have used citation mapping to show the existence and characteristics of a previously unacknowledged field of research. Thus, studying research on the application of the Quran in healthcare, Nadi-Ravandi and Batooli (2022) showed that while there are no scholars or academic centers focusing on this specific topic, there are nevertheless over 300 articles published on this subject, which can be divided into six themes. The authors use this data to call for investing more academic resources towards research on this topic.

Building on this prior work, this study demonstrates the capabilities of scientific mapping tools for the study of complex concepts in political science by focusing on the illustrative example of scholarship on organizing. Organizing is a particularly useful case study for scientific mapping because of the complexity of the term. Unlike other terms that are more straightforward and idiosyncratic in meaning, such as "fake news" or "social entrepreneurship," organizing is a generic

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word with multiple meanings that is used extensively to refer to diverse concepts in myriad scientific fields. Han et al. (2021) capture the linguistic and conceptual challenge of the term "organizing" in efforts to identify and advance a coherent body of literature and accumulated knowledge:

> In public and scholarly discourse…the word "organizing" has been commonly used to refer to any effort that organizations make to engage ordinary people in public life. Everyone, from those working in the tradition of Saul Alinsky to marketing-based social entrepreneurs, from union organizers to get-out-the-vote canvassers, has used the term "organizing" to describe what they do. It often seems like anyone seeking to engage the mass public in any sort of activity adopts the label of "organizer," rendering the term too vague… (Han et al. 2021, 21)

We address this challenge by developing and implementing a search strategy that adapts established methods in the bibliometric literature (Arora et al. 2013; Huang et al. 2015). While most studies concerned with bibliometric search methods to date have focused on expanding the search beyond a set of core terms to cover wider grounds related to a specific topic (Arora et al. 2013; Chen and Song 2019; Huang et al. 2015), we focus on narrowing down a search for a broad theoretical concept and term that yielded too many irrelevant results. Given this objective, which is relevant for social science research on complex theoretical topics, we combined and modified two approaches - "core lexical search" and "expanded lexical search" (Huang et al. 2015), to formulate what we call "narrowed lexical search."

The "narrowed lexical search" strategy enabled us to overcome the challenge embedded in conducting a literature search in well-established scholarly databases for terms with ambiguous or generic nature. We exemplify this method in the following sections using the illustrative example of organizing. However, this method can be easily adapted in future research to study a variety of similarly elusive concepts in political science.

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Data and Methods

Our data on scholarly works comes from the Web of Science (WoS). Our preliminary research used both WoS and Scopus—the two scientific literature databases that have been identified in prior research as containing the most accurate references data (Visser et al. 2021). However, consistent with prior work (Van Eck and Waltman 2018), we found that WoS was preferable due to a smoother integration of its output files into the citation mapping software, especially in relation to parsing references into their constituent elements, such as author names, and publication years. We therefore followed common practice in the literature to use WoS as the source for all data concerning scholarship about our topic of interest (Huang et al. 2015; Kullenberg and Kasperowski 2016).

Our main challenge was to define a search term on WoS that would capture as much of the relevant literature on organizing as possible, while retrieving a manageable share of "noise," that is irrelevant results that can be subsequently screened out manually. Reviewing technical literature on search strategies, we found that most studies were concerned with expanding the search beyond the original term in order to cover wider grounds related to a specific topic (Arora et al. 203; Chen and Song 2019; Huang et al. 2015). However, in our study, a simple search for "organizing" in the "Topic" field on WoS yielded a large number of mainly irrelevant results (82,215 results[3]). Our task was therefore to narrow and focus the search on relevant results.

To this end, we developed a strategy that combines existing approaches (Arora et al. 2013; Huang et al. 2015), which we call "narrowed lexical search." This strategy adapts techniques included in two established approaches in bibliometric studies - core lexical search and expanded

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[3] Search performed on November 16, 2022.

lexical search (Huang et al. 2015), to ultimately narrow the search of a concept represented by a generic and versatile word.

In a core lexical search, search terms are identified through a literature review and are subsequently vetted by experts (Arora et al. 2013; Huang et al. 2015). This search produces a core dataset. Subsequently, an expanded lexical search can be used to expand the core dataset. This expanded search involves extracting frequently occurring terms in the keyword fields of records in the core dataset and then vetting these terms based on a measurement called "noise ratio" – an estimate of the share of irrelevant records retrieved by the search term (Arora et al. 2013; Huang et al. 2015). Moreover, to enhance the precision of this search, some of the terms are defined as contingent terms, meaning that they are only included in the search when appearing alongside another term.

Our narrowed lexical search combines and modifies elements from both search strategies. Starting from the "core lexical search," we identified search terms through a literature review. However, to overcome the generic nature of the term "organizing," which yields too many irrelevant results, and to avoid the shortcomings of relying only on expert opinion to vet the search terms (Chen and Song 2019; Huang et al. 2015), we applied modified versions of two narrowing and vetting techniques included in the expanded lexical search strategy, namely contingent terms and noise ratio.

Thus, instead of using "organizing" as an independent search term, we identified in the literature adjacent contingent terms, meaning words that appear next to the term "organizing" and modify its meaning (e.g. *community* organizing). All our search terms adhered to this contingency format. Second, we developed a modified version of the "noise ratio" measurement. The "noise ratio" measurement uses the core dataset as a benchmark for its calculation, whereas in our case,

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such a benchmark dataset does not exist. Hence, we created an equivalent measurement, labeled "hit ratio," evaluating the relevancy of the 10 most cited records retrieved by each search term. As in the expanded lexical search (Huang et al. 2015), we applied a 70% hit rate threshold to determine whether to include or exclude each contingent term. This process yielded 21 contingent terms to be used in our search (see table of contingent terms, hit rates, and the final Boolean search term in Appendix 1).

This strategy yielded a dataset of 2,305 records extracted from Web of Science.[4] The oldest record was from 1967 and the most recent from 2022. The dataset contains 2,061 journal articles, 128 books, 77 proceedings papers, and 39 book chapters. Based on WoS subject categories, the most active disciplines with more than 100 records in the dataset included Industrial Relations & Labor (15.0% of records), Sociology (13.1%), Public Environmental & Occupational Health (8.4%), History (8.0%), Social Work (7.8%), Political Science (7.6%), Education (6.0%), Interdisciplinary Social Sciences (5.1%), and Urban Studies (4.6%). This distribution demonstrates the diversity of disciplines in the dataset.

Following best practices in the citation mapping literature (Kullenberg and Kasperowski 2016), we manually vetted all search results in the dataset. The purpose of the vetting was to ensure that the dataset includes only relevant results, as well as to identify and code sub-categories in the organizing literature. The coding scheme was divided into a main category, which determined whether a record is relevant for the study of organizing in the context of politics and democracy, and a secondary category, which included the geographical context of the article (the full coding scheme is included in Appendix 2). Coding was carried out by two independent coders, and inter-coder reliability was at 96% in the main category and 80% in the secondary category.

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4 Search performed on October 30, 2022.

We then used the dataset to create the visual maps. To this end, we used VOSviewer (version 1.6.18), a software tool for constructing and visualizing bibliometric networks (Van Eck and Waltman 2010), which is commonly used in the literature due to its wide range of mapping capabilities and clear visual outputs (e.g., Kullenberg and Kasperowski 2016; McAllister et al. 2022; Van Nunen et al. 2018).[5] In Appendix 3, we include a simplified synthesis of multiple guides and tutorials for using VOSviewer (e.g., McAllister et al. 2022; Van Eck and Waltman 2018) that are relevant for replicating our findings.

We follow recommendations in the literature to create and use thesaurus files for certain maps (McAllister et al. 2022). These files are used to eliminate duplicate records and to create uniform formatting for records with distinct formats. The thesaurus table that we used for the co-citation maps is included in Appendix 4.

Results

Thematic Analysis

What topics and sub-fields exist in the study of organizing? How well-connected are these sub-fields to one another? To answer these questions, we used a terms co-occurrence map (Figure 1). Following common practice in the literature, this map shows terms that appeared at least 15 times in the author keywords and keyword plus fields of the dataset (Van Eck and Waltman 2017). While 90 terms met this threshold, 86 remained after using a thesaurus file for this map. The size of the nodes represents the number of records in which these terms appeared. The links between nodes represent the co-occurrence of two terms in the same records.

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[5] For a review of additional tools for visualizing science networks, see Van Eck and Waltman (2014)

Figure 1: Terms Co-occurrence Map
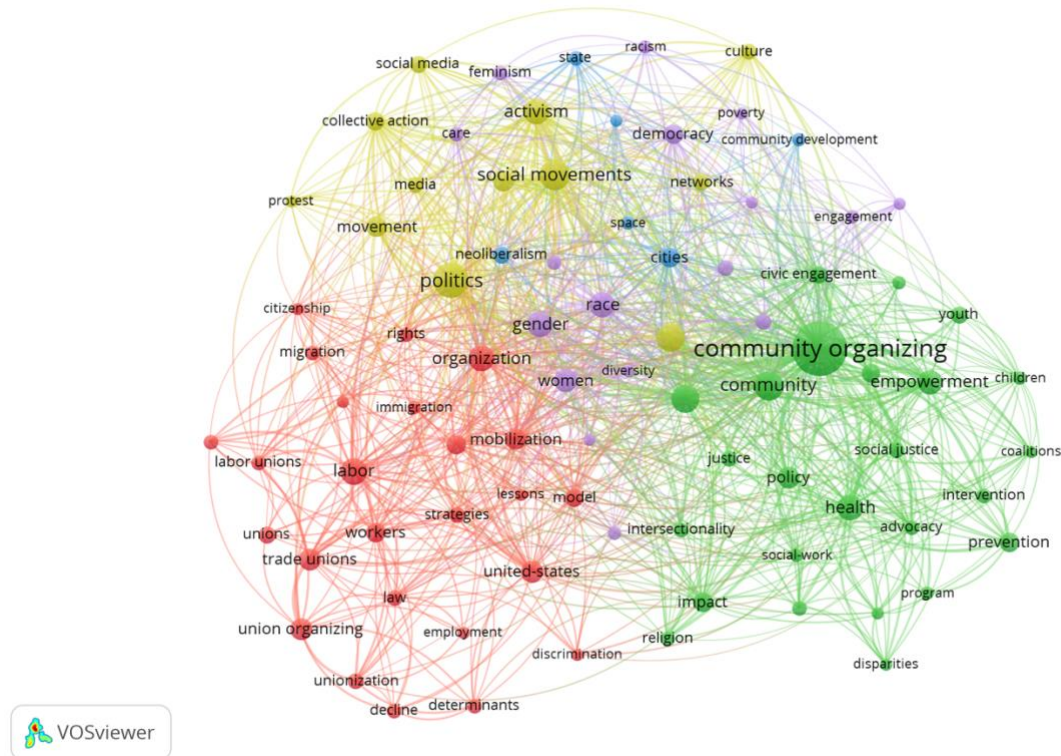
Note: n=86 out of total of 5,466 keywords, using the common criterion for inclusion in co-occurrence maps of keywords that occur at least 15 times.

These findings for the term "organizing" demonstrate a cohesive map relative to research on other topics (e.g., Kullenberg and Kasperowski 2016; Van Eck et al. 2013). This map also shows the range of topics most frequently discussed in the literature on organizing and the connections between them. The five distinctive clusters of co-occurrence terms, which are represented in the map in different colors, reflect different thematic fields. Observing the terms in each cluster, we characterize the themes of the main content of each of these five clusters as follows:

(1) Red – labor, union
(2) Blue – urban studies, community development
(3) Green – community organizing, intervention programs, policy, justice
(4) Purple – identity politics, gender, race

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(5) Yellow – social movements, media, activism

Additionally, the top 10 most frequently mentioned terms are indicated in Table 1 (see Appendix 5 for the full terms list).

Table 1: Top 10 Co-occurring Terms

Keyword	Occurrences	Total link strength
community organizing	289	554
politics	124	328
social movements	92	270
community	82	220
participation	76	225
power	74	232
labor	72	172
health	67	183
activism	66	212
gender	66	162

Notes: Total link strength represents the number of co-occurrences, i.e., times a keyword co-occurred with other keywords.

This table demonstrates the prevalence of research on community organizing, which is significantly more common than any of the other terms. It also shows the strong connection of scholarship on organizing to politics – the second term on the list. While politics in the map is colored yellow, it is very well connected to all five clusters, showing that each of the themes represented by the clusters is significantly connected to the study of politics. Moreover, the list shows that all clusters, except urban studies (blue), contain terms included in the top 10 list, indicating that this cluster is relatively less dominant in the literature on organizing.

In addition, the terms co-occurrence map reflects valuable insights embedded in the location of each term. Proximity of terms on the map represents a stronger connectedness. An analysis that considers terms' locations shows that the sub-fields of labor (red) and community organizing (green), while connected to other themes, are relatively autonomous and self-referential

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apart from other clusters. Thus, there are no red or green nodes scattered within the general area of other clusters. In contrast, the subfields of gender/race (purple) and urban studies (blue) are significantly intertwined with other clusters, meaning that they represent themes that are of interest in other sub-fields of the literature.

Citation Networks

Who writes about organizing? Who forms part of research communities that publish research on organizing? And how well-connected and integrated are these research communities? To answer these questions, we used a direct citations map (Figure 2).

Figure 2: Direct Citations Map
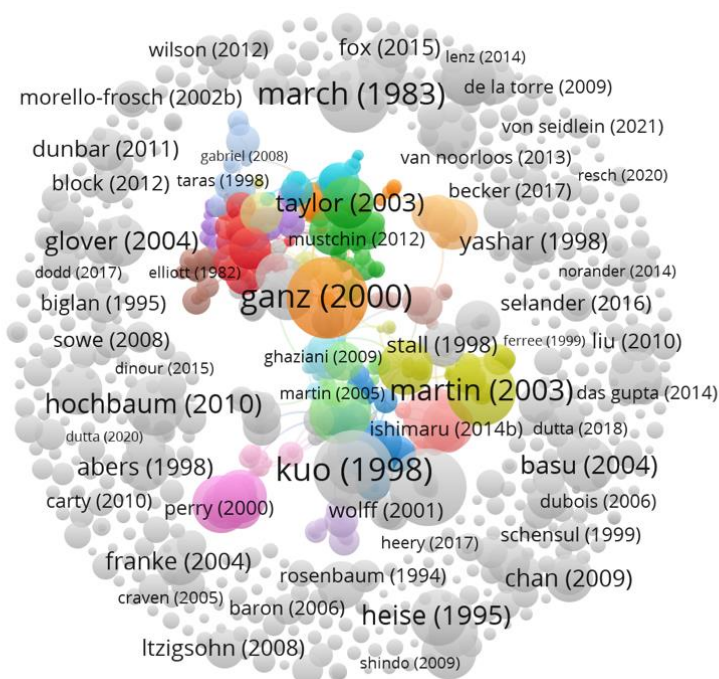
Note: n=910 out of the main dataset of 2,305, using the common criterion for inclusion in direct citation maps of sources that have at least 5 citations.

This map shows citation relationships between records. It includes all records in the dataset with at least five citations (910 out of 2,305). The threshold for this map was selected based on common

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practice in the literature (Booth-Tobin et al. 2021). The size of each circle represents the overall number of citations. The lines between nodes represent citation links between records. The clusters represent groups of records that are more strongly related to each other. Proximity represents closer connectedness of records, and the overall position of a record on the map represents how well it is connected to all other records. The gray nodes at the periphery are articles that do not cite and are not cited by any other record in the dataset. Over half of the records (52%) are isolated in terms of citations. Moreover, even in the group of connected articles in the middle of the map, which consists of 439 records (48%), there are 55 clusters, with 24 of them consisting of only two records. This relatively dispersed structure is common for direct citation maps across various disciplines and fields (Van Eck and Waltman 2014).

Canonical Literature

What is the canonical literature on organizing? Does scholarship on organizing share a core theoretical foundation, or is it divided into research streams with distinctive theoretical cores? If streams are identified, what themes characterize each stream, and do the distinctive streams talk with one another? To answer these questions, we used a co-citation map (Figure 3).

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Figure 3. Co-citation Map
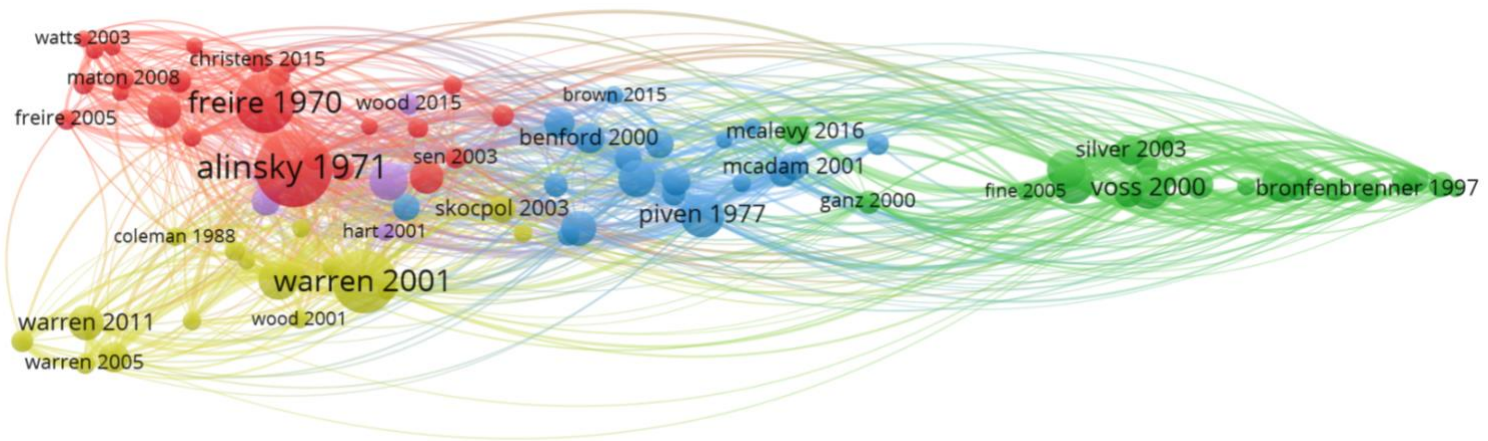
Note: n=86 out of total of 2,305 references, using the common criterion for inclusion in co-citation maps of sources that have been cited at least 15 times by records in our dataset.

Following common practice in the literature (Ding and Yang 2022), this co-citation map shows all references that were cited at least 15 times by records in our dataset (86 references). The lines between the nodes represent co-citation of two references by the same record. This map represents canonical literature referenced in research on organizing as it documents the core body of literature cited frequently by scholars of organizing. Thus, all records in the map are connected to other records. Moreover, the map contains five clusters, which can be described as five research streams connected to similar or closely linked bodies of canonical literature. We characterize the thematic description of the main content of each of these five research streams as follows:

(1) Green – labor (Voss and Sherman 2000; Silver 2003).
(2) Blue – social movements theory (Piven and Cloward 1977; McAdam, Tarrow and Tilly 2001; Benford and Snow 2000).
(3) Yellow – civic associations, social capital, and American democracy (Coleman 1988; Skocpol 2003; Warren 2001; 2005; Warren and Map 2011).
(4) Red – community-based, praxis, empowerment theory (Alinsky 1972, Freire 1970, Christens and Speer 2015).
(5) Purple – faith-based organizing. Even though this cluster only has 4 records, the content of the studies in this cluster are clearly coherent thematically. This cluster is also well-integrated in co-citations with other clusters, as it has meaningful co-citation links with the green (labor), yellow (civic) and red (community-based) clusters.

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Taken together, the co-citation map shows that four of these five clusters are strongly connected with each other (clusters 2-5), whereas the labor cluster (cluster 1) is more self-referential, as most of its sources are cited by other studies in the same labor cluster. Also of interest here is the existence of core works that serve as a bridge between the research streams. For example, Ganz (2000) and McAlevey (2016) are categorized in the labor stream, yet are positioned closer to the social movements theory stream, showing that they are frequently cited alongside canonical works in both streams.

Moreover, we can identify entire research streams that serve as bridges between other disparate research streams. For example, social movements theory (blue) is located in the middle between the labor stream (green) and the rest of the streams. Its position indicates that social movement theories are well-cited in several research streams, including research on labor organizing on community organizing, civic associations, and faith-based organizing.

It is noteworthy that the themes of the clusters in the co-citation map (Figure 3) correspond only partially to the terms co-occurrence map (Figure 1). Labor and community organizing, which are most conspicuous and autonomous in the terms co-occurrence map, are also distinctively apparent in the co-citation maps. Social movements also constitute a distinct cluster on both maps. However, urban studies and gender/race studies disappear as distinct clusters in the co-citation maps, whereas faith-based organizing and social capital/civic associations emerge. These observations serve as a starting-point for a future study to understand why this difference exists: whether it is due to temporal changes in the thematic interests of scholars, with canonical literature representing longer-standing research streams, or whether it is due to a lack of a shared theoretical

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foundation of studies on organizing in the fields of urban studies and gender/race, compared with a wider consensus on canonical literature in the fields of labor and community organizing.

Conclusions

As shown in this article, citation mapping is an effective tool for producing and visualizing comprehensive data-driven reviews of fields of research. By using the illustrative example of scholarship on organizing as a form of collective action, this study showed the literature on organizing coalesces around five clearly delineated themes of research, as well as five thematically distinguishable research streams that draw upon shared theoretical foundations. We also identified the most common themes in the literature and the most cited works in each of the research streams. Moreover, the study showed how citation maps can be used to identify core works that serve as a bridge between distinctive research streams.

Moreover, the search strategy presented in this paper – "narrowed lexical search" – can be applied to study a variety of concepts with generic or versatile terminology in political science, such as "state," "preferences," "discourse," and "media."

Taken as a whole, this study has advanced our understanding of the research on organizing as a distinct field of scholarship. Future studies that seek to further advance this research agenda can build on this study to compare and contrast the scientific landscape of organizing as presented here with scientific landscapes of other related forms of collective action, such as mobilization, non-violent protest, and digital activism – to help identify and visualize the theoretical distinctions across research on these distinct forms.

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Appendix 1: Adjacent Contingent Search Terms

Search term	Hit ratio in top 10	Relevant articles in top 10 most cited	Number of results	Decision
Union*	100%	10	347	Include
Grassroots	100%	10	155	Include
Worker*	100%	10	92	Include
"Social movement*"	100%	10	44	Include
Immigrant*	100%	10	26	Include
Protest*	100%	10	25	Include
"Direct action"	100%	7	7	Include
"Social action"	100%	4	4	Include
Transformational	100%	1	1	Include
Community	90%	9	1071	Include
Labor	90%	9	230	Include
Campaign*	90%	9	87	Include
Feminist	90%	9	69	Include
Neighborhood	90%	9	31	Include
Faith-based	90%	9	15	Include
Political	80%	8	133	Include
"For change"	80%	8	40	Include
Radical	80%	8	14	Include
Relational	70%	7	16	Include
Democratic	70%	7	15	Include
Civic	70%	7 (3 inconclusive)	12	Include
Electoral	66%	2	3	Exclude
Progressive	55%	5	9	Exclude
Native	50%	1	2	Exclude
Bottom-up	42%	3 (1 inconclusive)	7	Exclude
"Collective action"	40%	4 (2 inconclusive)	25	Exclude
Online	30%	3	63	Exclude
Community-based	30%	3	17	Exclude
Non-electoral	NA	0	0	Exclude

Resulting Boolean search term used for Web of Science search:

TS=("Organizing" Near/0 (Community OR Neighborhood OR Labor OR Worker* OR Immigrant* OR Civic OR Democratic OR Radical OR Grassroots OR Union* OR "Social movement*" OR Faith-based OR Campaign* OR Feminist OR "Social action" OR Protest* OR "Direct action" OR Political OR "For change" OR Relational OR Transformational))

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Appendix 2: Coding Scheme

<u>I. Organizing</u>
Main Category Coding

Coding categories: 0=No, 1=Yes
1. The main decision in the coding process is whether the term "organizing" is applied in the title, abstract or keywords of a study with the general meaning associated with politics and democracy.
2. Consistent with established methodologies, coding is carried out at the <u>term</u> level (Kiritchenko et al 2014; Weeg et al 2015). For the current study, this means coding is conducted in relation to how the term "organizing" is used in the text relevant for coding (i.e., the title, abstract, or keyword).
3. Step 1: in preparation for coding, coders should read a definition sheet ([link](#)) containing classic examples from the literature of the use of organizing in its intended context.
4. Step 2: For each record in the dataset, coders are asked to answer the following question: "in your judgment, does the use of the term 'organizing' that flagged the record's retrieval refer to a meaning of the term that is within the general context of politics and democracy?" (question adapted from Weeg et al 2015).
5. If the answer is no, code 0; if the answer is yes, code 1.

<u>II. Geographic Context</u>
Note: If the main category coding of organizing is 0=No, this secondary category is automatically coded as 9=Not Applicable (NA)

Coding categories: 1=US only; 2=US +; 3=non-US context; 4=no clear context, i.e. theory
1. We are coding to distinguish sources that study the US only, versus other sources.
2. The coding for this field should be applied as follows:
   - 1=US only: publications with empirical focus exclusively on the US
   - 2=US +: publications with empirical focus on the US and other countries
   - 3=non-US context: publications with empirical focus on the US and other countries
   - 4=no clear geographic context, i.e. theory: publications with no explicit reference to specific geographic contexts
   - 9=irrelevant: publications coded "no" in the main coding category
3. While many publications have a theoretical aspect that applies to diverse geographic contexts, the focus in coding this field is on the empirical context included in the publication. Thus, if a study develops a general theoretical argument based on fieldwork in the US, it will be coded as 1; likewise, if fieldwork was carried out in the US and other countries, it will be coded as 2.
4. Some publications do not involve empirical research, but refer to the specific political or social context of the US. For example, publications focused on racial relations in the US, or on the US federal government structure, are US-focused and should be coded 1.

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5. Some studies do not mention the geographic context in the title and abstract. For these studies, search for the full source by copying the title of the study into Google Scholar, and skim the source to code geographic context.

References for Appendix

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Appendix 3: Guide for using VOSviewer

Below is a basic guide to performing citation mapping using Web of Science as the database and VOSviewer version 1.6.8 as the visualization software that can be used to replicate the maps reported in the article. This guide was prepared by Aya Shoshan.

1. Install VOSviewer on your computer https://www.vosviewer.com/download
2. Go to Web of Science via your university proxy.
3. In Field, Choose Topic, then enter a search term (e.g. labor organizing).
4. Add other fields to search as necessary (e.g. Language = English, Document Type = Article).
5. Document your search in a separate file and via screenshot.
6. At the top of the results list, click Export -> Tab Delimited File.
7. Select "Full Record and Cited References" in the Record Content field.
8. WoS only permits downloading 500 records at a time. Additional records can be download in batches by filling in 1-500, 501-1000 etc.
9. Launch VOSviewer
10. Click Create…
11. Choose Create a map based on bibliographical data.
12. Choose Read Data from bibliographical database files.
13. Upload files downloaded from WoS (several files can be uploaded at once).
14. This and the next screens are the most crucial in designing your map: choose the units you want to analyze (nodes in the map); the type of analysis (links or connecting lines on your map), counting method, and other settings.
15. Document all choices in a separate file and via screenshots. This is very important since VOSviewer does not let you view the choices you have made after the map is produced.
16. Choose thresholds. Document your choice.
17. Choose the number of units on the map, document your choice.
18. Choose if you want to see only the main clusters or all units on the map. The choice depends on the objective of your analysis.
19. After the map is created, you can:
    a. Save print screens in .png format
    b. Save the map files (two files - map file and network file - make sure to save each by a different name otherwise one will be lost). You can use these files to upload the map again at a different time.
20. The use of Thesaurus files is recommended to clean the data, avoid different spellings and formatting of duplicate values, and create a uniform format for nodes on the map. The resources noted below provide guidance on how to do this..

Additional Resources, Webinars and Manuals:
1. Webinar with detailed explanation of citation mapping for paper published on "fake news"
2. VOSviewer Manual
3. Thesaurus File How-To Video

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Appendix 4: Thesaurus File, Co-Citation Map

Label	Replace by
[anonymous], 2006, learning power org e	
[anonymous], [no title captured]	
[no title captured]	
alinsky s., 1971, rules radicals pragm	Alinsky 1971
alinsky s.d., 1946, reveille radicals	Alinsky 1946
alinsky sauldavid., 1971, rules radicals pract	Alinsky 1971
arnstein sr, 1969, j am i planners, v35, p216, doi 10.1080/01944366908977225	Arnstein 1969
benford rd, 2000, annu rev sociol, v26, p611, doi 10.1146/annurev.soc.26.1.611	Benford 2000
bennett wl, 2012, inform commun soc, v15, p739, doi 10.1080/1369118x.2012.670661	Bennett 2012
bronfenbrenner k, 1997, ind labor relat rev, v50, p195, doi 10.2307/2525082	Bronfenbrenner 1997
bronfenbrenner k, 2004, rebuilding labor: organizing and organizers in the new union movement, p17	Bronfenbrenner 2004
bronfenbrenner k., 1998, org win new res unio, p19	Bronfenbrenner 1998
bronfenbrenner kate, 1998, org win new res unio	Bronfenbrenner 1998
brown w, 2015, near futures, p1	Brown 2015
castells m., 1983, city grassroots cros	Castells 1983
castells m., 2012, networks outrage hop	Castells 2012
charmaz k., 2014, brokerage closure in, v2nd	Charmaz 2014
christens bd, 2010, j community psychol, v38, p886, doi 10.1002/jcop.20403	Christens 2010
christens bd, 2015, soc iss policy rev, v9, p193, doi 10.1111/sipr.12014	Christens 2015
clawson d., 2003, next upsurge labor n	Clawson 2003
coleman js, 1988, am j sociol, v94, ps95, doi 10.1086/228943	Coleman 1988
crenshaw k., 1991, stanford law rev, v43, p1241, doi [10.2307/1229039, doi 10.2307/1229039 10.3917/cdge.039.0051]	Crenshaw 1991
defilippis j., 2010, contesting community	Defilippis 2010
eaton ae, 2001, ind labor relat rev, v55, p42, doi 10.2307/2696185	Eaton 2001
fantasia rick, 2004, hard work remaking a	Fantasia 2004
fine j, 2005, polit soc, v33, p153, doi 10.1177/0032329204272553	Fine 2005
fine j, 2007, brit j ind relat, v45, p335, doi 10.1111/j.1467-8543.2007.00617.x	Fine 2007
fine janiceruth., 2006, worker ctr org commu	Fine 2006
fisher robert, 1994, let people decide ne	Fisher 1994
freeman rb, 1990, ind labor relat rev, v43, p351, doi 10.2307/2524126	Freeman 1990
freeman richardb., 1984, what do unions do	Freeman 1984
freire p., 1970, pedagogy oppressed	Freire 1970

freire p., 2005, ed critical consciou — Freire 2005

freire paulo., 2000, pedagogy oppressed — Freire 1970

ganz m, 2000, am j sociol, v105, p1003, doi 10.1086/210398 — Ganz 2000

gittell r., 1998, community org buildi — Gittell 1998

glaser b. g., 1978, discov grounded theo — Glaser 1978

granovetter ms, 1973, am j sociol, v78, p1360, doi 10.1086/225469 — Granovetter 1973

han h., 2014, org dev activists ci — Han 2014

hart stephen, 2001, cultural dilemmas pr — Hart 2001

harvey david, 2005, brief hist neolibera — Harvey 2005

keck m., 1998, activists borders ad, doi 10.7591/j.ctt5hh13f — Keck 1998

kelly j, 1998, rethinking ind relat — Kelly 1998

lopez steven henry, 2004, reorganizing rust be — Lopez 2004

lukes s., 1974, power radical view — Lukes 1974

maton ki, 2008, am j commun psychol, v41, p4, doi 10.1007/s10464-007-9148-6 — Maton 2008

mcadam d., 1982, political process de — Mcadam 1982

mcadam d., 2001, soc movement stud — Mcadam 2001

mcalevy jane, 2016, no shortcuts org pow, doi 10.1093/acprof:oso/9780190624712.001.0001 — Mcalevy 2016

mccallum jamie k., 2013, global unions local — Mccallum 2013

mccarthy jd, 1977, am j sociol, v82, p1212, doi 10.1086/226464 — Mccarthy 1977

mediratta k., 2009, community org strong — Mediratta 2009

miles m., 2013, qualitative data ana — Miles 2013

milkman r, 2004, rebuilding labor: organizing and organizers in the new union movement, p1 — Milkman 2004

milkman r, 2006, la story immigrant w — Milkman 2006

minkler m., 2012, community org commun — Minkler 2012

mondros j. b., 1994, org power empowermen — Mondros 1994

morris a, 1984, origins civil rights — Morris 1984

piven f. f., 1977, poor peoples movemen — Piven 1977

piven, poor people s moveme — Piven 1977

polletta f, 2001, annu rev sociol, v27, p283, doi 10.1146/annurev.soc.27.1.283 — Polletta 2001

polletta francesca, 2002, freedom is endless m — Polletta 2002

putnam r., 1993, making democracy wor — Putnam 1993

putnam rd, 1995, j democracy, v0006 — Putnam 1995

putnam robertd., 2000, bowling alone collap — Putnam 2000

rappaport j, 1987, am j commun psychol, v15, p121, doi 10.1007/bf00919275 — Rappaport 1987

sen r, 2003, stir it lessons comm — Sen 2003

shirley d, 1997, community org urban — Shirley 1997

silver, 2003, forces labor — Silver 2003

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skocpol t., 2003, diminished democracy	Skocpol 2003
smock kristina, 2004, democracy action com	Smock 2004
snow da, 1986, am sociol rev, v51, p464, doi 10.2307/2095581	Snow 1986
speer pw, 1995, am j commun psychol, v23, p729, doi 10.1007/bf02506989	Speer 1995
stall s, 1998, gender soc, v12, p729, doi 10.1177/089124398012006008	Stall 1998
stoecker r, 1997, j urban aff, v19, p1, doi 10.1111/j.1467-9906.1997.tb00392.x	Stoecker 1997
swarts h. j., 2008, org urban am secular	Swarts 2008
tilly c., 1978, mobilization revolut	Tilly 1978
tollefson j., 1994, power movement socia	Tollefson 1994
verba sidney., 1995, voice equality civic	Verba 1995
voss k, 2000, am j sociol, v106, p303, doi 10.1086/316963	Voss 2000
waldinger roger, 1998, org win new res unio, p102	Waldinger 1998
warren m, 2011, match dry grass comm	Warren 2011
warren m. r., 2001, dry bones rattling c	Warren 2001
warren mr, 2005, harvard educ rev, v75, p133, doi 10.17763/haer.75.2.m718151032167438	Warren 2005
watts rj, 2003, am j commun psychol, v31, p185, doi 10.1023/a:1023091024140	Watts 2003
watts rj, 2011, new dir child adoles, v134, p43, doi 10.1002/cd.310	Watts 2011
weiler p, 1983, harvard law rev, v96, p1769, doi 10.2307/1340809	Weiler 1983
wood r. l., 2002, faith action relig r	Wood 2002
wood richard l. l., 2015, shared future faith	Wood 2015
wood richard, 2001, faith based communit	Wood 2001
yin r.k., 1994, case study res desig, v2nd	Yin 1994
zimmerman ma, 1995, am j commun psychol, v23, p581, doi 10.1007/bf02506983	Zimmerman 1995
zimmerman mark, 2000, hdb community psycho, p43, doi 10.1007/978-1-4615-4193-6_2	Zimmerman 2000

Appendix 5: List of Keywords with Over 15 Occurrences

Keyword	Occurrences	Total link strength
community organizing	289	554
politics	124	328
social movements	92	270
community	82	220
participation	76	225
power	74	232
labor	72	172
health	67	183
activism	66	212
gender	66	162
organization	66	192
race	64	178
empowerment	60	194
women	53	146
union organizing	49	85
trade unions	47	98
policy	46	126
united-states	46	132
mobilization	42	168
movement	42	112
identity	41	98
democracy	40	97
work	40	92
workers	40	98
cities	38	98
impact	36	94
prevention	36	70
education	35	78
collective action	33	120
model	32	85
neoliberalism	29	70
unions	29	37
civic engagement	28	107
social media	28	72
youth	28	61
justice	27	63
networks	27	64

social justice	27	82
law	26	65
leadership	26	96
strategies	26	67
culture	25	78
grassroots organizing	24	28
media	24	67
unionization	24	60
determinants	23	46
intersectionality	23	88
management	23	38
labor unions	22	62
state	22	72
advocacy	21	74
care	21	29
decline	21	36
environmental justice	21	59
feminism	21	48
intervention	21	55
rights	21	70
globalization	20	49
migration	20	44
religion	20	61
children	19	38
engagement	18	39
immigration	18	48
racism	18	48
community development	17	46
inequality	17	48
program	17	30
social change	17	41
social-work	17	49
space	17	41
citizenship	16	38
coalitions	16	42
discrimination	16	45
disparities	16	52
diversity	16	56
employment	16	33
participatory research	16	47

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performance	16	36
poverty	16	45
social capital	16	50
agency	15	35
governance	15	38
lessons	15	39
migrant workers	15	49
protest	15	56

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