A Content Analysis of *Comparative Education Review*

1957-2016*

The Graduate Students of Introduction to Comparative Education

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Instructors: Patricia Bromley & Julia Lerch

* Correspondence can be directed to Patricia Bromley at pbromley@stanford.edu.
Executive Summary

In 2016 the students in “Introduction to International and Comparative Education” at Stanford conducted a guided research project to analyze longitudinal changes in content of the journal *Comparative Education Review*. They developed a protocol that took 10-20 minutes per article to code (see Appendix B), coded articles, compiled and cleaned the data, analyzed results, and presented findings in the following reports. In total, they analyzed 59 issues of *Comparative Education Review*, a total of 301 articles. The sample includes the first issue of each year from 1957 to 2016, except in cases of special issues where the second issue of the year was coded. The key findings include:

- **Geographic Focus:**
  - Most articles focus on North America or Western Europe
  - 58% of articles focus on a single county case study (176 total)
    - The cases are widely spread, covering 74 discrete countries. Only eight countries are the focus of more than five papers: China (16), Israel (11), USA (8), Germany (7), Japan (7), India (6), Mexico (6), USSR (6)
  - Just over 10% of articles focus on the global level through the 1980s, by the 2000s this jumps to over 25%
- **Authorship:**
  - Overall, 74% of authors are male
    - The gender gap in authorship was extreme in the early years, but starts narrowing in the mid-1990s and authorship is close to even by the 2000s
    - Papers authored by men and women are cited at roughly the same rate
  - 44% of papers have at least one author with a primary affiliation in the US
- **Methodology**
  - Theoretical papers and essays accounted for over half of articles in the 1950s and 1960s, but less than 10% of articles since the 1990s
  - Since the 1970s, roughly one third of articles use regression; overall, about one quarter of the articles used qualitative methods
- **Topics**
  - 23% of articles use the word “globalization” at least once but only about 10% use the word at least two times
  - Equality, gender, minorities, and policy mentions increased over time, with minorities and equality mentions beginning in the 1990s
  - Economics, politics, and policy are the most mentioned terms of those we considered
  - Economic mentions were highest between 1970s and 1990s and have since decreased (along with politics and finance)
  - Public education is a greater focus than private education throughout
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CHAPTER 1

An Analysis of the Comparative Education Review Journal: Distribution by Regional Occurrence from 1957-2016

Amelie Byun, Lynn Hu, Robi Wrigley, Fareeda Zikry
**Introduction**

The intent of this study began with a desire to understand the nature of international comparative education (ICE): what delineates this field and makes it unique? Ongoing debates about how to define the field focus on methodology, with notable emphasis on what makes a study comparative (Bereday, 1957; Koehl, 1977; Little, 2000; Rust, Soumaré, Pescador, & Shibuya, 1999). The field’s interdisciplinary nature creates a dynamic in which the field of ICE encapsulates varying perspectives, such as the inherent debate between cross-national and global approaches to understanding the field (Brickman, 1960; Crossley, 2001; Klees, 2008; Noah, 1984). Many conceptualizations have surfaced over the field’s history to answer such queries, yet there are few works that endeavor to critically explore this field and its construction (Cook, Hite, & Epstein, 2004). Previous studies aimed at configuring a broad analysis of the field focused on surveying academics’ perceptions of the field, citation analysis, and course content analysis (Cook et al., 2004; Little, 2000); but these have done little to create consensus around the nature of ICE. There is still a need for an in-depth, cohesive survey of the current state of knowledge (Cook et al., 2004) within the field of comparative education. Thus, the overarching question this paper aims to address is what comprises the state of knowledge in ICE? This project aims to address this question by surveying the *Comparative Education Review* (CER) journal, and reviewing the first regular edition of each volume, for all of the years published from 1957 to 2016.

By assessing the number of journals across decades, we found that the terms “international education” and “comparative education” peaked in the 1960s; however, by the 2000s, there is a shift in the writing towards “global education.” This transition reflects not only the evolving nature of ICE (Bray & Murray Thomas, 1995), but it also captures the global
context of the field. By analyzing the frequencies of regions in CER, our study has revealed patterns of distinct world-orders that are dependent upon the time period in which they are situated. The purpose of this study is to provide an overall analysis across time periods, to create an overarching understanding of the existing knowledge within the field of ICE. Through analyzing these different patterns, our study allows for a greater sense of global change, which helps us to further understand the existent knowledge within the field. The changing nature of knowledge and the sensitivity of historical contexts are important aspects of ICE (Cook et al., 2004). By surveying the span of existing literature across time periods, we can clearly see a gap in the literature. The marked deficit evinces that there is an underrepresentation of certain regions, while there is an overrepresentation of other regions – specifically, Western countries. An underrepresentation of certain regions creates a stratified world-order, highlighting the roles and structures of Western countries within a globalized context.

Our study is situated within the lens of the World Systems theoretical framework. World Systems theory is a political approach to explaining the world economic system in which some countries benefit (the core) while others are exploited (the periphery), perpetuating the maintenance of a stratified world-order (Wallenstein, 1970; Chirot, 1982; Hall, 1982). Our data show a consistent trend of studies focusing on Western countries, while leaving other regions (i.e. Central Asia) largely underrepresented. The state of knowledge represented through a regional analysis reflects an academic preference of a stratified world-order similar to that discussed in World Systems theory.

Our approach to assessing the state of knowledge and filling the gap in literature is to examine the geographic dispersion of articles throughout the journal’s existence. In order to know what constitutes the field’s knowledge, it is essential to understand the origins of said
knowledge. It would be difficult to make assertions about the field’s focus without a comprehensive knowledge base, especially one that includes geography. To that end, we examined the regional distribution of journal articles by decade. We analyzed regions rather than individual countries because regional dissemination gives a clearer indication of the field’s concentration; greater trends may be lost when examining individual countries that are evident when looking at regions. The regions are divided into eight categories based on the UNESCO’s classification: Arab States; Central and Eastern Europe; Central Asia; East Asia and the Pacific; Latin America and the Caribbean; North America and Western Europe; South and West Asia; and Sub-Saharan Africa.

As a further component of this research, we examined the distributions across decades. History is a vital component to understanding the field of ICE - particularly, given its interdisciplinary makeup (Brickman, 1960; Crossley, 2001; Klees, 2008; Noah, 1984). As a combination of social sciences (Klees, 2008), the field inherently needs to incorporate a historical aspect to its analytical lens, which naturally includes political and economic elements. Unfortunately, the historical facet has not been prioritized, as the field continues to favor studies regarding policies that are future-oriented. However, by looking at trends across decades, we infuse history back into the field of comparative education (Cook et al., 2004). We reviewed historical events to analyze the dispersal of regional studies across time, finding emphases on wars and crises. While other historical markers may be used, wars and crises invoke notable and lasting effects on education; logically, it follows that ICE scholars would take it upon themselves to analyze such effects. CER’s longstanding establishment as a leading comparative education journal was an asset for this study: it allowed us to assess the state of knowledge within ICE by reviewing the field’s top articles. By doing so, we compiled a comprehensive knowledge base
concerning the regional and historical distribution of studies, with the goal of contributing to a clear understanding of the changing state of knowledge in ICE.

**Data & Methods**

We used data collected from the top journal in the field of ICE, CER, to answer the aforementioned research questions. Our dataset included all of the research articles, research notes, and theory building essays found within the first issue of the year in CER, from 1957 to 2016, yielding a total of 301 articles and essays. Information about introductory statements, presidential letters, editorials, movie or book reviews, or other formats of content were not included in the dataset. For each essay or article meeting our requirements, we employed a coding survey, which included seven separate sections that focused on different topics. Since we were only concerned about examining the change of geographic focus in the ICE studies, we used data from the geography section (Section 4) and selected information that was relevant to our research question from the coding survey.

There were four questions in Section 4: (a) questions about geography do not apply to this article (agree-1, disagree-2); (b) is the study at global or cross-national level? (no-0, yes-1) if no, does the study focus on a single country? (not applicable-0, no-1, yes-2) if yes, please list (country name text); (c) does the study have a geographic focus? (no-0, yes-1) if yes, what world region is the study focused on? (regional codes); (d) is the study explicitly focused on a group of countries not captured in ideas of geographic region or global level? (no-0, yes-1) if yes, describe (country group text).

In our project, we chose to focus on data from question C, which aligned with our research question, and we used regional codes to analyze the geographic focus trends within studies over time. The regions were coded as follows: 0 - Not Applicable; 1 - Arab States; 2 - Central and
Eastern Europe; 3 - Central Asia; 4 - East Asia and the Pacific; 5 - Latin America and the Caribbean; 6 - North America and Western Europe; 7 - South and West Asia; 8 - Sub-Saharan Africa; 9 - Other. These regional codes are established by UNESCO.

We began by cleaning the data before analyzing the regional codes. We altered inconsistent countries codes so that they had uniform names, making changes to the following countries: People’s Republic of China to China, Soviet Union to USSR, United States to USA, England and Scotland to UK, North Korea and South Korea to the Koreas, East/West Germany to Germany (articles published before 1991). Secondly, we checked answers from questions (a-d) to identify any mis-coding that resulted from mistakes or different understandings of the coding questions. Then, we formed a universal rule for editing and revising the misaligned data, to make the regional codes consistent, which was to change all misaligned data based on the single country text in question (b). Finally, we made necessary changes to the misaligned data according this rule and created a clean dataset for our project.

For instance, in one coding survey, the answer for question (a) was 1, which shows that questions about geography did not apply to this article, but the answer for question (b) was 1 (that the study is global or cross-national) and China, which shows that the study focused on a single country: China. The regional code in question (c) was then missing in this coding survey. Under this circumstance, we applied our rule and changed all misaligned data and filled out the regional codes as 4 - East Asia and the Pacific based on the single country text (China). We have made the following changes on the regional codes following the same standard: China- region 3 and region 0 to region 4, Israel- region 6 to region 1, USSR- region 9 to region 2, Iran- region 9 to region 1, Kentucky- region 9 to region 6, Germany- region 0 to region 6, Cameroon - region 0 to 8, Tanganyka- region 0 to 8.
We analyzed 244 articles with at least one regional focus and 57 articles without any regional focus. In our graphs, we divided the 244 articles into eight regions based on the regional codes and then arranged them by decade. We also included the regional codes reported as 9 (multiple regions) listed in question (c) for articles that had multiple regional codes. This allowed us to create 8 graphs showing the total number of studies in each region by decade. We counted 23 articles that have regional foci in region 1 (Arab States; Figure 1.1), 29 in region 2 (Central and Eastern Europe; Figure 1.2), 4 in region 3 (Central Asia; Figure 1.3), 52 in region 4 (East Asia and the Pacific; Figure 1.4), 39 in region 5 (Latin America and the Caribbean; Figure 1.5), 68 in region 6 (North America and Western Europe; Figure 1.6), 19 in region 7 (South and West Asia; Figure 1.7), and 41 in region 8 (Sub-Saharan Africa; Figure 1.8). We created a world map that shows the frequency of studies by regions, which provides an understanding of the regional foci in the articles (Figure 1.9). We also created a graph of 57 non-regional focused articles by decade (Figure 1.10).

Furthermore, we combined the studies with different regional foci into one graph, showing the percentage of studies done in each region by decade (Figure 1.10). This graph allowed us to see which region attracted more attentions from scholars during each decade.

**Findings**

Our primary findings concentrated on the first research question: what is the regional distribution of CER journal articles by decade? We divided the articles based on region and number of occurrences. The graphs represent the number of studies over the decades for each region: (1) Arab States, (2) Central and Eastern Europe, (3) Central Asia, (4) East Asia and the Pacific, (5) Latin America and the Caribbean, (6) North America and Western Europe, (7) South and West Asia, (8) Sub-Saharan Africa, (9) no regional focus (these
mostly pertain to articles associated with the former Soviet Union and Eastern Bloc countries).

Figure 1.1 presents the number of studies in the Arab States by decade. There is a clear rise in the number of articles in the 1980s. There is a small number of studies (less than 5) in the 1950s, with a rise in the number of articles starting in 1960, and a peak in 1980 of 8 articles. After 1980, the number of articles decreased for every decade with just 1 journal article in the 2010s.

Figure 1.2 presents the number of studies in Central and Eastern Europe by decade. There are few articles before the 1960s; the maximum number of articles occurred in the 1960s, with 10 studies. After the 1960s, the number of articles continued to decrease until the 1990s - after that, there was just 1 article in the 2010s.

Figure 1.3 presents the number of studies in East Asia and the Pacific by decade. The maximum number of articles occurred in the 1960s, with 13 total; by the 2010s the number of articles had decreased to just 8.

Figure 1.4 presents the number of studies in Central Asia by decade. There were relatively few articles for this region. Less than 5 studies were conducted in Central Asia in the 1950s, 1960s, and 2000 combined, with no articles in the 2010s.

Figure 1.5 presents the number of studies in Latin America and the Caribbean by decade. There was a steady rise of articles before the 1990s; this region had its peak of studies in the 1990s with over 10 articles. After this peak, articles continued to decrease until the 2010s, there was total of 5 articles.

Figure 1.6 presents the number of studies in North America and Western Europe by decade. This region maintained a steady amount of studies from the 1950s to the 2010s. There
was a maximum of 23 articles in the 1960s; this decreased to 5 articles in the 2010s.

Figure 1.7 presents the number of studies in the South and West Asia by decade. There were generally few articles across all time periods. This region reached a maximum of 5 articles in the 1970s, but by the 2010s, the number of articles had decreased to 3.

Figure 1.8 presents the number of studies in Sub-Saharan Africa by decade. The maximum number of articles of 10 occurred in the 1970s; afterwards, there was a general decrease, resulting in only 3 articles by the 2010s.

Figure 1.10 presents the graph for countries that did not fit in any specific regional focus, such as the former Soviet Union and Eastern bloc. There were 57 total articles for this graph, with a maximum of 18 articles published in the 1960s.

Figure 1.11 shows the distributional percentage of regions per decade. Column 1 shows that in the 1950s, North America and Western Europe accounted for the majority (23.5%) of the articles in the sample. Column 2 shows that in the 1960s, the majority of articles (36.0%) were also focused on North America and Western Europe. Column 3 shows that in the 1970s, Sub-Saharan Africa accounted for the majority (23.3%) of the articles. Column 4 shows that in the 1980s, once again, North America and Western Europe accounted for the majority (25.5%) of the articles. Column 5 shows the majority (32.4%) of the articles in the 1990s are focused on Latin America and the Caribbean. Column 6 shows that the majority of articles (58.0%) in the 2000s are concentrated on North America and Western Europe. In column 7, majority of the articles (30.8%) focus on East Asia and the Pacific. It is clear from these findings that North America and Western Europe account for the majority of the articles in the sample from 1950 to 2010.
Discussion

**Arab-States**

Based on the findings, the highest occurrence of articles for the Arab States was in the 1980s. This could be due to the number of conflicts in the region, which drew worldwide interest, such as the Iran–Iraq War from 1980 to 1989, the 1982 Israeli invasion of Lebanon, and the 1987 Intifada on the Gaza Strip. The Iran-Iraq war began when Iraqi armed forces invaded Western Iran along the countries’ joint border (Walvoord, 1980); one of the precipitating events that led to this war was the Iranian Revolution of 1979 (Dizaji, 2014). The Israeli invasion of Lebanon in 1982, “Operation Peace for Galilee,” was launched by Israeli Prime Minister. The Palestinian intifada occurred in 1987 as an insurrection against the Israeli occupation of the West Bank (Norton, 1991). These are all events that may have contributed to the frequency in articles for this region in the CER journal in Arab States in the 1980s.

**Central and Eastern Europe**

The number of studies focused on Central and Eastern Europe surged during the 1960s, concentrating primarily on the USSR. This large increase may be result of the Cuban Missile Crisis in 1962, when the US-USSR confrontation of the Cold War era reached its peak. The cultures of insecurity may have motivated scholars in the US to put more attention and resources on studying their rival country - the Soviet Union (Weldes, 1999). Central topics of the CER articles distinctively focused on the communist USSR school system such as “Recent Developments in the Soviet Schools,” “A Word about the Soviet Teacher,” “Educational Research in the USSR,” and “Soviet Economic Education.”

**Central Asia**

Compared to the number of studies done in East Asia, references to Central Asia within
CER are limited. There are many factors that might explain the underrepresentation of Central Asia in the knowledge of CER. UNESCO’s categorization of the whole region of Asia may be the reason behind the lack of studies on Central Asia. According to other international organization’s categorization of regions, Central Asia countries from UNESCO’s grouping are usually included with South and West Asia. Another aspect of this limitation stems from Central Asia’s inclusion in the Soviet Republic from 1918-1991. Most of the countries categorized under the “Central Asia” label were previously under Soviet rule, as satellite states (Wheeler, 1955). Thus, the lack of studies might be because many of the regions were considered part of the USSR.

*East Asia and the Pacific*

Based on the graph for East Asia, there is an increase in the number of studies during the 1960s and the 1980s. The principal country referenced within the region of East Asia is China. The cultural revolution in China that spanned from 1966 to 1976 could explain the first increase in the number of studies during the 1960s. The abrupt changes brought by the cultural revolution in China not only had implications domestically, but also internationally, garnering the attention of scholars worldwide (FitzGerald, 1968). The cultural revolution “aimed to reconstruct the governing political machine in a manner differing sharply from the original character of the Communist Party in China” (FitzGerald, 1968). Thus, many domestic changes were implemented in education, such as new curriculum and reconstruction of the school systems reflecting “Thought of Mao” (Robinson, 1968). The domestic adjustments had implications for the international realm, which saw changes in trade relations and political relations - these may have factored into the rise in number of studies in China as well.

Another event that could account for the increase in studies on East Asia could be the
Korean War in 1950-1953. Although the Korean War was a civil war, other countries, such as the U.S., China, and Russia, were highly involved. This international involvement demonstrates how complex international relations focused on East Asia played a crucial role in the events leading up to and during the Korean War. The Korean War also led to an increase in awareness of South Korea as a distinct actor - an important component for understanding the East Asian world-order.

The increase in the number of studies in the 1980s can be explained by the changes in the economic policies in China. During the 1980s, China’s growth rate as well as FDI (foreign direct investment) increased (Prybyla, 1980). Within this context of economic change, different ideologies supporting market-oriented economy surged. The shift from “planned economy” to a “market-oriented economy” not only had domestic implications, but international implications as well, as more international actors looked to China for investment opportunities. A rise in interest in China from an international perspective, spurred by financial opportunities, led to a natural increase in interest in other aspects of China as well: including analyzing the cultural, social and political contexts of the country. Emergence of East Asia as a leading actor in the global economy contributed to the increase in international attention from scholars.

Latin America and the Caribbean

The proliferation of articles regarding Latin America during the 1980s may be a result of the economic-debt crisis (Kaminsky & Pereira, 1996; Reinhart & Rogoff, 2011; Remmer, 1990); Latin America fell into this crisis after Mexico defaulted on its debt in 1982 (Remmer, 1991). As education and economics are closely intertwined, it follows that comparative education scholars would turn their concentration to this region of the world during this timeframe. Markedly, Latin America’s debt crisis coincides with both its overwhelming
transition to democracies over authoritarian rule (Remmer, 1991), and civil wars, like in El Salvador and Peru (Kalyvas & Balcells, 2010). Some scholars posit that this may have been a result of the “lowered standards of living, high unemployment, and depressed levels of investment” (Remmer, 1990, pp. 321–322). The combination of democratization and the debt crisis created ideal conditions for ICE research, since politics and economics are intertwined with education.

North America and Western Europe

The articles regarding North America and Western Europe during the 1960s and 1980s mirror pivotal timeframes of the Cold War. While the Cold War officially started at the end of World War II (Kalyvas & Balcells, 2010), tensions reached a critical level during the 1960s: this is when Soviet Russia officially amassed both the production and ability to launch nuclear weapons (Lebow, 1994). It makes sense, then, that ICE scholars would take significant interests in this region during these years, particularly since the “Cold War dominated international politics” (Kalyvas & Balcells, 2010, p. 416) - it surely would, then, dominate an international-focused discipline. The assurance of mutual annihilation may have decreased the urgency to stay focused on this region in subsequent decades, as the situation, albeit tense, embodied its very nomenclature. There were alternative regions with more pressing issues needing to be studied during these quieter Cold War years. However, with all the events during the 1980s that led up to the downfall of the Soviet Union, interest the field’s interest was renewed in this region during these years; this continued through the Warsaw pact and eventual end of the Soviet Union (Kalyvas & Balcells, 2010; Lebow, 1994).

South and West Asia

There are bulk of studies on this region are done during the 1970s, largely focusing on
India. The increase in the number of studies may be due to the rise of India as a global actor, starting in the 1970s; from this point on, India gradually gained its voice in the global community as a post-colonized country. In 1961, the Indian Army overthrew the Portuguese, which established India as country free from foreign-colonial control, the first instance in four hundred years. As India’s economy started to grow rapidly, two of India's leading financial dailies, the Economic Times and The Financial Express, also launched in 1961 (Mihir Bose, 2007). These events could have contributed to the increase in scholars studying the Indian subcontinent. CER articles focusing on India include topics, such as “Educational and Social Dynamics of the Examination System in India” and “Educational Politics and Public Policymaking in Maharashtra, India.”

Sub-Saharan Africa

As noted in the findings, the maximum amount of articles on Sub-Saharan Africa occurred in the 1970s. This could be explained by the emergence and freedom of newly decolonized African nations. In the 1960s alone, 17 African countries, 14 of which had been ruled by France, broke free from their European control. These were Cameroon, Togo, Mali Senegal Madagascar the Democratic Republic of the Congo, Somalia, Benin, Niger, Burkina Faso, Côte d’Ivoire, Chad, the Central African Republic, the Republic of the Congo, Gabon, Nigeria, and Mauritania (Easterly, 1997). This would have brought increased attention to Sub-Saharan Africa, subsequently increasing scholars’ interest for the region, which is reflect in the CER journal. These independence movements continued in the 1970s, 1980s, and the 1990s with the freedom of Angola (1975), Mozambique (1980), Zimbabwe and Namibia (1997) (Easterly, 1997). This could explain the upwards trend in the frequency of articles shown by in the graphs for the decades of the 1970s, 1980s, and 1990s.
Percentages

By combining all the article counts from each region during each decade, we combine the percentage share of regional studies into one graph (Figure 1.11; Figure 1.12, Figure 1.13). The North America and Western Europe region has a dominant role in the contribution to the ICE field, for it has the highest amount of articles throughout the 1950s, 1960s, 1980s, and 2000s. In the most recent decade, 31% of the articles in the dataset focused on East Asia and the Pacific region, indicating a shift within ICE from the Western-centered regions to East-Asian centered regions (mainly China).

Limitations

There are some limitations affecting this study. The main concern is the accurate representation of the data. Since the data were obtained from one single journal with a limited volume of articles and essays, the 301 articles and essays in our sample may not serve as a precise representation of the total amount of articles, pertaining to the different aspects of ICE. This sample size may not accurately represent actual trends. Using a five-year timeframe, instead of decades, and including more journal articles, could have allowed for a better understanding of the different trends.

There is also the considerable obstacle when cleaning the data, that of the definitional constriction for each regional category. On one hand, the categories are too broad and do not include two important areas in the globe: “Middle East” and “North Africa.” Arab States are usually not used to define North African countries (for example, Algeria, Egypt, Libya, Morocco, Tunisia are not considered “Arab States”); therefore, it can be problematic to group such countries into one single regional category. Additionally, the distinction as to whether Mexico is in North America or Latin America was unclear - its geographic location
is in North America, but its political and cultural components align more with Latin America. For cohesion in our project, we decided to code Israel and Iran as part of the Arab States, and Mexico as a Latin American country. Furthermore, it was difficult to distinguish Central Asia (region 3) from West Asia (region 7) due to the overlapping geographic locations. This may be the reason why there is such a limited focus on Central Asia.

Moreover, regional categories do not reflect the changes that countries experienced over time (e.g. East/West Germany evolving into Germany and the USSR before and after 1991). Varying coders had different perception of whether to categorize regions politically or geographically. Some regions or territories that articles concentrated on were hard to label and categorize by these restricted regions, since geographic location does not necessarily capture political association.

**Conclusion**

The objective of this research was to assess the state of knowledge in the field of ICE, along with examining the geographic dispersion of articles throughout the journal’s existence. The overall patterns throughout the graphs demonstrate that ICE shifts its regional focus in accordance with global events. Our findings indicate that these shifts followed wars and crises, and that, in addition to a global focus, there were historical aspect as well. Historical events, in fact, can be used to contextualize these global trends within education, as shown through the analysis of our regional graphs. An economic framework might also be applicable as a further dimension of the field, which could be the focus of future research. These different approaches are highly relevant given the multidisciplinary nature of ICE.

The current field of knowledge in ICE follows the “important” current events and global trends. However, the current events that are labeled as “important” are those that mainly focus
on and involve Western regions or the interests of Western nations. The articles primarily focused on Western countries, and they, in fact, were mostly authored in Western countries. Of these articles, 42.7% were authored in the United States, with the subsequent 57.3% authored in other Western countries: the UK accounted for 7.1% percent of articles authored, whereas Germany accounted for 2.3% of the articles authored. Furthermore, as the results showed, the predominance of regional foci were on North America and Western Europe during the 1950s, 1960s, 1980s, and 2000s. It is clear from the findings that North America and Western Europe account for the bulk of the articles sampled from CER between the 1950s and 2010s. To further diversify the field of knowledge in ICE to encompass broader interests, research should not only incorporate Western driven events, but also events pertaining to non-Western regions. CER, as a journal, should work to evolve ICE as a field as global barriers pertaining to social, economic, and political interactions are surmounted. Currently, CER is promoting a one-sided view of ICE that is not representative of the field in the globalized world, where changes on the world stage call for a new way of viewing education and its relation to society. Comparative education is a field that should examine dynamic interactions between global trends, and the impact these trends have on education.

**Future Research**

Our study shows that the current knowledge in ICE follows current events that mostly involve crises and war. Thus, regions that are not necessarily involved as key actors in crises are not fully represented in studies. Research on education systems during peaceful times have just as many important implications as those of education systems during crises. Furthermore, the analysis of the small sample within the study can result in data biases - further statistical analyses should be taken to identify these biases. These statistical analyses could provide more
insights on sample size bias, justifying that a larger sample should be used, so that accurate conclusions can be ascertained.
Appendix 1.0:

Figure 1.1: Arab States

Figure 1.2: Central and Eastern Europe
Figure 1.3: East Asia and the Pacific

Figure 1.4: Central Asia

Figure 1.5: Latin America and the Caribbean
Figure 1.6: North America and Western Europe

Figure 1.7: South and West Asia

Figure 1.8: Sub-Saharan Africa
Figure 1.9: No Regional Focus

Figure 1.10: Regional Occurrences of CER Journal Articles
Figure 1.11: Percentage of Articles per Region by Decade

<table>
<thead>
<tr>
<th>Decades</th>
<th>Arab State</th>
<th>Central and Eastern Europe</th>
<th>Central Asia</th>
<th>East Asia and the Pacific</th>
<th>Latin America and the Caribbean</th>
<th>North America and Western Europe</th>
<th>South and West Asia</th>
<th>Sub-Saharan Africa</th>
<th>Total</th>
</tr>
</thead>
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<td>3</td>
<td>2</td>
<td>1</td>
<td>1</td>
<td>4</td>
<td>2</td>
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<td>22</td>
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<td>4</td>
<td>61</td>
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<td>1970s</td>
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<td>6</td>
<td>0</td>
<td>5</td>
<td>5</td>
<td>9</td>
<td>5</td>
<td>10</td>
<td>43</td>
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<tr>
<td>1980s</td>
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<td>1</td>
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<td>12</td>
<td>7</td>
<td>13</td>
<td>3</td>
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<td>1990s</td>
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<td>5</td>
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<td>2000s</td>
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<td>5</td>
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<td>8</td>
<td>6</td>
<td>11</td>
<td>2</td>
<td>8</td>
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<tr>
<td>2010s</td>
<td>1</td>
<td>1</td>
<td>0</td>
<td>8</td>
<td>6</td>
<td>4</td>
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Figure 1.12:

<table>
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<th>Decades</th>
<th>Arab State</th>
<th>Central and Eastern Europe</th>
<th>Central Asia</th>
<th>East Asia and the Pacific</th>
<th>Latin America and the Caribbean</th>
<th>North America and Western Europe</th>
<th>South and West Asia</th>
<th>Sub-Saharan Africa</th>
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<tr>
<td>1950s</td>
<td>5.88%</td>
<td>17.65%</td>
<td>11.76%</td>
<td>5.88%</td>
<td>5.88%</td>
<td>23.53%</td>
<td>11.76%</td>
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</tr>
<tr>
<td>1960s</td>
<td>6.56%</td>
<td>16.39%</td>
<td>1.64%</td>
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<td>6.56%</td>
<td>36.07%</td>
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<tr>
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<td>13.95%</td>
<td>0.00%</td>
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<td>0.00%</td>
<td>23.53%</td>
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<td>8.82%</td>
<td>0.00%</td>
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<td>4.65%</td>
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   *Doing Comparative Education Research, 7925*(May), 43–65.
   https://doi.org/10.1080/0305792990290305


CHAPTER 2

An Analysis of the Comparative Education Review Journal:

Subject-Country Survey Analysis

Xueting Ding, Muchemi Niuguana, Marriam Musa, Sofia MacGregor, Larkin Wills
Introduction

The aim of this project is to map where existing knowledge in International and Comparative Education (ICE) has originated since the field was formed. To answer this question, we will first look at membership to the Comparative and International Education Society (CIES). Founded in 1956, this organization works with ICE organizations to inform theory of comparative education and communicate practice in developing countries (CIES, 2016). Membership of this organization is made up of giants in all the fields of social science. Although the organization attracts research from a wide variety of disciplines, we are interested in knowing whether the research is evenly distributed geographically.

A survey conducted by Cook et al. (2016) found that out of the 1,345 members of CIES in the year 2000, 940 resided in the United States and 405 resided abroad. Analysis of data showed that 75.1% of members of CIES hailed from North America. To what extent does this lack of diversity among contributing researchers affect the field’s main function? Altbach (1991) sees the function of comparative education as “analyzing educational problems by providing an international perspective to discussions and debate.” Ninnes (2008) explains that during the twentieth century, the field has had the desire to go above educational systems and include societies and nations, which formed the basis of the world system theory. The goal of our research is to evaluate available literature in comparative education to show that the unilateral flow of information has had an impact on theory and practice in comparative education.

This study uses a world systems theoretical lens that posits organizations in the field of comparative education have promoted a world culture that is marked by Western values of “individualism, voluntaristic authority, rational progress, and world citizenship” (American, Review, Apr, & Thomas, 2012). World culture is constituted by “actors” (states, organizations,
and individuals) who are driven primarily by self-interest. Mazrui (1975) expressed concern that the dominance of knowledge by core “cultural corporations” spread western ideology to the periphery. Mazrui believed that students come out of these institutions of learning and become “cultural captives of the west” (Clayton, 2016). Berman (1983) goes further to argue that the unidirectional flow of information is purposeful as the alignment obtained from educational assistance puts developing countries in positions ripe for exploitation. However, the theory leaves room for ICE to move toward a more nuanced understanding of education in relation to economic, political, and social factors (Arnove, 2016). We use the world systems approach to evaluate the extent to which peripheral countries are included in the data set and look for patterns of geographic resistance.

The question we pose is this: how inclusive is the field of ICE in the process of knowledge creation? What is the relationship between authors and subjects in core and peripheral countries?

Data and Methods

We use information from Comparative Education Review (CER), the official journal of CIES, to explore trends in the geographical location of author and subject matter. CER was chosen for its longevity as a publication. The journal has published 4 issues per year since 1957, spanning nearly six decades of research and making it an extensive directory of vetted scholarship in the field. Through its mission statement, CER is expressly committed to advancing knowledge on the place of education in countries other than the United States (CER, 2016) and is therefore a fitting archive to evaluate our research question regarding geographical trends in ICE literature.

Chosen because of its prominence and longevity, CER is nevertheless a limited data set. Its Western origin gives it a predominantly Western perspective that may not adequately capture
the research interests of non-Western authors and institutions. Furthermore, subjects represented in the academic publication may lag behind research conducted through non-academic organizations in the field. Recognizing and tracking these publication biases geographically is one of the central objectives of this study.

From the online catalogue of CER available through JSTOR, we collected a stratified sample of 302 articles. We began the selection by accessing the first issue from each of the 59 publication years. We then selected research articles, research notes, and theory building essays published in each issue, excluding non-research content such as introductory statements, book reviews, and presidential letters from the analysis.

In order to examine the geographical trends in author and subject location, we developed the coding scheme in Appendix A. Our team of 30 researchers hand-coded each article for its identifying information (author, title, year, volume, issue) and geographical information (author location [country association at time of publication], regional or single-country subject, cross-national or global focus). To resolve differing conceptions of “world regions,” we adopted the UNESCO regional and country profiles as standard (UNESCO, 2014). For a more detailed account of the coding scheme, see Appendix A.

After collection, the data were cleaned for inconsistencies in nomenclature. When deciding between multiple applicable terms, we chose those that were concise and most inclusive. For example, “UK” was used in place of “United Kingdom,” “England,” “Great Britain,” “Scotland,” and “Northern Ireland.” Our data on author’s country of origin was affected by inconsistent reporting; author identifying information was excluded from front matter in the following years: 1957, 1958, 1963, 1965, 1966 and 1974.
Findings

In this section, we present results from four separate analyses. First, we present results on the frequency of countries identified as the primary subjects of articles in the sample to determine geographical areas of focus (Section 3.1). Next, we present results on the frequency of contributing author locations in our sample to determine potential sources of bias (Section 3.2). We then check these findings with an analysis matching author location to subject countries in the sample (Section 3.3). Finally, we present an analysis matching author location to articles with non-geographical focus to determine the theoretical orientation of the field (Section 3.4).

Section 2.3.1: Subject Country Frequency

This bar graph above (Figure 2.1) shows the frequency of countries identified as the single subject of an article. The sample includes 175 observations. Due to the large volume of countries with only one mention, this figure was cleaned to present only countries identified as the subject of two or more articles within the sample.

Section 2.3.2: Author Country Frequency

The pie graph above (Figure 2.2) shows the frequency of contributing author locations in our sample. Since some publication years excluded this information, our sample is limited to 354 observations. The category “other countries” includes those countries hosting fewer than five authors. A more detailed breakdown of these locations can be found in Appendix B. This analysis includes all contributing authors, which means that some authors in the sample represent a

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1 The term “China” in our project only includes mainland China. Hong Kong and Taiwan were coded separately.
2 Countries mentioned once: Austria, Bahamas, Bangladesh, Belgium, Belize, Botswana, Cambodia, Cameroon, Chile, Colombia, Cuba, Estonia, Greece, Haiti, Honduras, Iraq, Jamaica, Korea, Malawi, Mali, Netherlands, New Caledonia, New Zealand, Norway, Pakistan, Palestine, Papua New Guinea, Paraguay, Peru, Philippines, Poland, Puerto Rico, Singapore, Spain, Sudan, Swaziland, Syria, Taiwan, Tanganyka, Tunisia, Turkey, Yugoslavia, and Zaire.
3 These countries are: Pakistan, South Africa, Spain, New Zealand, Thailand, Brazil, Denmark, France, Iran, Japan, Mexico, Netherlands, and Nigeria.
common paper. Strikingly, United States scholars produce the most research in our sample. This result leads us to question: how many papers in our sample have at least one author from the United States?

The pie chart above (Figure 2.3) represents the proportion of articles with at least one author located in the United States. It shows that almost half of all articles in our sample have an author producing research in the United States.

Section 2.3.3: Author Country Matched with Subject Country

The pie chart above (Figure 2.4) represents the percentage of articles in which the subject country matches with at least one of the authors’ countries. In 72% of the cases, none of the author's countries matched the country of the study. In 24% of the cases, at least one of the authors was located in the country studied. This chart indicates that most of the literature is remotely produced. The previous chart is limited to 152 observations due to two main limits of the data set. First, country name was coded for only single-country articles. Second, for multiple years, there was no information available on authors’ associated countries.

The pie chart above (Figure 2.5) again represents the percentage of articles in which the subject country matches with at least one of the authors’ countries. In this chart, however, all the observations that had at least one author from the United States are excluded. These exclusion criteria limited the number of observations to 53. This chart shows how, when excluding the United States authors from the sample, the proportion of studies produced remotely is reduced by 22 percentage points.

Section 2.3.4: Author Country Matched with Global Focus

The pie chart above (Figure 2.6) shows the proportion of author locations for articles with non-geographical (global) foci. The data set identified 89 articles with a global focus, however
the analysis is limited to the 69 observations coded for author location. The figure shows the United States is the major contributor to global research.

Due to the large volume of countries with only one mention, the chart above (Figure 2.7) was cleaned to present only author countries identified for two or more articles with a non-geographical (global) focus. This exclusion criterion limited the observation count to 57. The chart shows author countries producing the most non-geographical and theory-oriented research.

**Discussion**

Our analysis produced significant findings on the geographical trends among authorship and subject matter presented in CER, with implications for how the field of ICE can become more inclusive in the process of knowledge creation.

In section 3.1, Figure 2.1 shows that China receives the most frequent mentions as the single subject country in our sample. During recent decades, China has witnessed considerable economic development, urbanization, and educational improvement, which may make it a popular topic of research. Interestingly, Israel is the second most studied subject country, perhaps because this country maintains top performing educational institutions despite ongoing sociopolitical conflict. Among the top ten countries studied are representatives from the following continents: Asia, Europe, North America, and Africa. One unexpected finding is that Singapore and Finland, with high-performing education systems, are not on this graph. The frequency of Singapore as a single subject is one, and Finland is not mentioned in our sample. However, it is possible that these countries are mentioned in comparative articles, and were not coded as a result.

In section 3.2, the Figure 2.2 illustrates a striking result. In our sample, authors in the United States produce by far the most research in CER; the percentage of all authors located in the United States is more than fifty. Figure 2.3 shows the percentage of papers with at least one author
from the United States, which comprise almost half (44%) of our sample. This indicates that ICE research is largely driven by institutions in the United States, and indicates a potential for Western bias, especially regarding articles with non-Western subjects. However, our data set provided information on authors’ location at the time of publication. Due to the international composition of contributing research institutions in the United States, author location does not indicate author origin. We should be wary in interpreting these results, since many non-Western scholars produce knowledge in the United States.

Section 3.3 aims to analyze how authors’ countries are related to subject countries. In other words, this section’s main objective is to verify whether the literature is produced locally or remotely. Two different figures elucidate the geographic relationship between author and subject. Figure 2.4 indicates that most of the literature is produced remotely, since none of the authors’ countries match the article subject in approximately 72% of the observations. This mismatch between authors and subject countries may limit the contextual understanding of education issues researched. Furthermore, this situation may mean that education problems to be framed in biased ways. However, the fact that our database does not provide information about the author’s country of origin is a limitation for this analysis. Future research on this topic is needed to show how zooming in on unique differences within these countries can better inform research. Figure 2.5 aims to correct for this possible source of bias by excluding all observations that have at least one author from the United States. With this exclusion, the proportion of studies produced remotely reduces to 50 percent. The fact that around half of the research is produced remotely is unsurprising. Remote research is common for developing countries without the resources to conduct studies internally.

The final section matches author location to articles coded as “non-geographic,” indicating
a global theoretical perspective. We found that Western countries like the United States of America and the United Kingdom to dominate the production of theoretical literature in CER (Figure 2.6 and 2.7). Figure 6 details the countries of all authors contributing to non-geographical articles, and Figure 2.7 simply shows those with more than one observation. Figure 2.7 therefore provides a clearer picture of the most dominant theoretical contributors to the field of ICE. Most theoretical frameworks originate from institutions in the US and all major theoretical contributors are Western. Since theories provide lenses to interpret educational realities and establish ideological standards, the origins of theoretical work have immediate consequence for the field. Our findings indicate strong biases in theoretical articles dominated by a few countries.

**Limitations**

The coding scheme limited our country-level analysis in multiple ways. Coders entered the subject country names only for studies with a single geographical focus, therefore, our data set excludes country-level identifiers for articles with multiple locations. Recording the names of countries included in comparative articles will expand the sample size of future studies and allow for more in-depth analysis of content by geographical location. Another limitation of the data set is the lack of nuance regarding author location. Using the available CER Front Matter, coders were able to approximate author’s country by the location of their affiliated institution. However, this is a blunt measure that fails to capture the movement of researchers, especially from peripheral countries into internationally renowned universities in the Western core. Future research comparing subject location to author location must therefore put considerable thought into gathering more nuanced data on author background.

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4 Australia is included in this “Western” categorization.
Conclusion

We began with the questions: how inclusive is the field of ICE in the process of knowledge creation? What is the relationship between authors and subjects in core and peripheral countries? Our analysis revealed that authors in the Western core produce by far the most research in CER. Almost half of our sample is comprised of papers with at least one author from the United States (Figure 2.3). Our next analysis confirmed that overall most research is produced remotely by Western institutions, however, excluding the research produced in the United States revealed hopeful trends in locally produced research. Finally, we traced theoretical knowledge in the field to primarily Western origin, revealing potential biases in the dominant frameworks for understanding ICE.

Our findings indicate that the field of ICE has failed to balance international authorship, and is biased to exclude peripheral voices. Our analysis confirms that the direction of knowledge unilaterally flows from the Western core. It is therefore imperative for the field to reexamine its relationship to the subjects of its extensive body of research. The field of ICE would benefit from leveraging cross-disciplinary methodologies focused on transforming situations of inequality and exclusion.
Appendix 2.0: Figures

Figure 2.1: Subject Country

Figure 2.2: Author Country
Figure 2.3: Authors in United States

Figure 2.4: Author Country and Subject Country
Figure 2.5: Author Country and Subject Country (excluding US authors)

Figure 2.6: Author Country and Global Focus
Figure 2.7: Author Country and Global Focus (excluding less than 5 mentions)

![Pie chart showing author country and global focus](image)

Figure 2.8: Author Country (fewer than 5 observations)

![Bar chart showing author country with fewer than 5 observations](image)
Appendix 2.1: Geography Coding Survey

Questions about geography do not apply to this article.

Agree (skip to next section)

Disagree

Is the study at global or cross-national level?

No

Yes, Describe: ______

If no, does the study focus on a single country?

Not Applicable

No

Yes. Please list: ______

Does the study have a geographic focus?

No

Yes

If yes, what world region is the study focused on? Select all that apply.

Not Applicable

Arab States

Central and Eastern Europe

Central Asia

East Asia and the Pacific

Latin America and the Caribbean

North America and Western Europe
South and West Africa

Sub-Saharan Africa

Other. Briefly Explain: ___________

Is the study explicitly focused on a group of countries not captured in ideas of geographic region or global level?

No

Yes. Describe: ___________
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CHAPTER 3

An Analysis of the Comparative Education Review Journal:

Comparative Education in the Era of Globalization

Calla Buttker, Caetano Siqueira, Daniel Smith
“… the task of comparative education has to be done, because in this time of growing international contact we cannot afford the luxury of ignorance about the education and the ideals which other nations try to commit to the next generation, and we must also know something about the methods they apply in the process”

Introduction

The world is a considerably different place today than it was when Robert Ulrich (1957) wrote the words above in the first volume of *Comparative Education Review* (CER). For one, humans have since traveled to the moon and back. Just under half of the world’s entire population today has access to the internet: an incredible 3.5 billion people (ITU 2016). The Iron Curtain has fallen and one of the largest supranational cultural, economic, political endeavors in history, the European Union, is now 23 years old with 286 member countries. Even more, the contemporary world faces problems of truly global import, such as climate change, mobile terror, and economic recession. Yet, Ulrich’s words could not ring truer today — precisely because of these ongoing processes of globalization, whereby times and distances for capital, information, communication, people, goods, and even problems to travel have been dramatically reduced. Both “other nations,” as Ulrich notes in the post-WWII era, and people in those nations have neither been in closer contact nor more tightly interconnected in history of the world.

However, we see not only the threat of ignorance and isolation in contemporary times of intensely closer social contact as a justification for the field of comparative education. We also see these sociocultural processes of globalization as well as a fundamental shift in

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5 Ulrich, R. (1957, p.4)
6 This is a pre-Brexit figure.
‘worldview’ from the nation-state to the global level as possibly productive analytic lenses to view and learn about the field itself.

How can a shift to the global view be an analytic lens to view comparative education? Take, for example, Bray & Murray’s (1995) three-dimensional cube that they illustrate with their argument for multi-level analyses in comparative educational studies (See Figure A.1 in Appendix). The length-dimension includes non-locational demographic groups (e.g. women and minorities), the width-dimension the several facets education and society (e.g. finance or curriculum), and the height dimension possible levels of analyses. The highest level they illustrate is decidedly politico-geographic: world regions or continents, which are aggregates of lower-level forms of social organization, like countries, provinces, and districts. The merit of a given study, per Bray & Murray (1995), lies in its inclusion of successive levels or “vertical integration.” We illustrate this view in Panel A of Figure 3.1.

From our view, comparative social science, within the field comparative education and other disciplines, such as International Relations, Economics, Political Science, and Sociology have before and since considered an eighth level which, epistemologically, moves beyond political boundaries to consider the truly global level in social, cultural, economic, and political spheres. We note two examples in comparative education. In her piece on world orders and their mutually constitutive relationship with educational multilateralism, Mundy (1998) argues that a “global” education system exists in earnest. It is characterized by a specific globally hegemonic ideology that international organizations promote and pursue in their agendas of educational assistance across the world. Contemporary, globally circulating normative views, such as those that value less market regulation or increased competition as a more efficient mechanism for educational provision, condition the variation in structure and aims of international
organizations providing services and aid. This, in turn, conditions variation in educational provision in national and even local education systems. With a similarly global view, Ramirez, Meyer, and Lerch (2016) argue that, in the last decades, a global educational policy model emerged and has since become institutionalized. This model is replete with a set of prescriptive virtues of educational policy (e.g., education should be universal and emancipatory) that have been themselves conditioned by a world culture of “optimism” in best practices and high standards. From their view, “the global weight is greater in the more recent era” in the articulation of education policy across the world (p. 60). We illustrate this view in Panel B of Figure 3.1.

If our first contention is that a shift to the global view of the world is an important development in the last years that might be a lens increasingly applied in the field of comparative education, then our second contention is that globalization as ongoing sociocultural, economic, and political processes might also give insight into the empirical priorities of the field. From our view, globalization is not only a predictor of educational change through cross-national policy transfer, as implied in Ulrich’s focus on the educational “methods” of other nations or as Ramirez et al.’s focus on educational “best practices.” We also see globalization as an ontological affront: an occasion that has demanded theorization not only of the dynamics whereby goods, people, and capital move across the face of the world, but also of the underlying motives and processes by which certain ways of organizing, ideas, and cultural norms and values come into being and have triumphed over others at the global level.

Take, for example, two sets of conceptual frameworks that arose in the social sciences to explain variation across societies in the age of globalization. The first set might be termed as functional-realist theories and include such frameworks as human capital development
(Fagerlind & Saha 1989), modernization (Bernstein 1971), world-system theory (Clayton 1998), and dependency theory (Noah & Eckstein 1988). From these perspectives, global variation across modern and contemporary states and their national education systems is best explained as outcomes of states and organizations purposively pursuing their own interests in the larger world context. These frameworks are applied with the assumption that education is a universalistic rational means — applicable the world over — with which individuals can get more skills and knowledge, societies seek progress and development, states more or less successfully compete in the global economy, and organizations and states secure or contest the power and advantage of historical patterns of political and cultural domination. The second set of theories might be termed as constructivist and include, as one example, world society theory (Meyer et al 1997). This perspective explains convergence across states as an outcome of their conforming to the cultural order of the world social environment in order to be regarded as legitimate. The assumption underlying this framework is that education is a cultural script that states enact rather ceremoniously. Both sets of conceptual frameworks themselves developed to understand an era when nation-states are increasingly interconnected in a globalized world, whether that be through a global economy, a world-cultural order, or both.

Taken together, since the formalization of the field of comparative education, marked here for convenience as the establishment of CER, dramatic material and epistemological transformations have occurred as a result of globalization. The empirical problem is whether both have some relationship with the field of comparative education over time. In the broadest sense, we are interested in what the body of knowledge actually looks like since Ulrich referred to globalization in the first volume of *Comparative Education Review*. Specifically, we interested in the ways the field has taken the “global turn” in its focus on education and whether
it seeks to account for what Ulrich described as “growing international contact” or what we name as globalization. To that end, we designed the current study to address two descriptive research questions:

(1) Has the field of comparative education shifted to a global focus? By posing this question, we mean to explore whether, to what extent, and where comparative education researchers turn to the global level as a specific focus of their research on education.

(2) Has the field of comparative education responded to globalization? By posing this question, we mean to explore whether, to what extent, and where comparative education researchers investigate globalization as a specific focus of their research on education.

In the proceeding sections, we describe how we designed the current study to answer these two research questions. Then, we report our findings and conclude with a short discussion in the context of similar studies that have sought to take stock of the field.

Data & Methods

To answer our two research questions, we use data that was collected in partial fulfillment of the final project for the course, “Education 202: Introduction to International and Comparative Education” at the Stanford Graduate School of Education. The students and instructors developed a coding protocol and collectively coded 301 published journal articles from the *Comparative Education Review* (CER) spanning from 1957 to 2016. *Comparative Education Review* was chosen for three primary reasons. First, as an academic journal, it represents at any given time the state of new knowledge produced in the field, as opposed to, for example, policy handbooks or other non-scholarly publications. Second, CER is the flagship
journal of the academic field of comparative education. As such, it offers the temporal breadth needed to observe whether and to what extent the field of comparative education has changed over time. Third, as a double-blind, peer-reviewed journal, the knowledge published in CER represents what the scholarly community has identified as some of the most rigorous and highest-quality research designs and theorization in the field.

Course participants divided themselves into groups to develop questions for the coding protocol concerning the articles’ authorship, empirical methods, geography, substantive content or focus, and system level and type of education. Priority in designing questions was given first to breadth of coverage in these topics and then to expediency in answering them: the target was 2-3 minutes to be spent answering each item. Course participants then piloted other participants’ coding questionnaire items, adjusted them according to preliminary feedback, and then submitted draft items to the instructors for final review and integration into the one comprehensive coding protocol covering all topics. The instructors then revised the questions and created the final coding protocol for the project using Qualtrics survey software. Every student, as well as the two course instructors, were then each randomly assigned two years during the period under investigation and proceeded to code every article of the first issue of CER of each of those assigned years, excluding special issues. Many of the journal issues included four main research articles, but some issues included more. During the coding period, the class convened once to address issues that arose during coding and to clarify what should be done in certain situations, so as to increase reliability.

Outcomes

For the current study, we focus on globalization in the field of comparative education. Our primary outcomes of interest are the number of occurrences “globalization” was mentioned
in the article (continuous variable) as well as whether the article had a “global focus” in its analyses (dichotomous). For the “globalization” variable, coders used Adobe software to view the article in portable document format (PDF) and then used the advanced search function to find all mentions of “globalization,” including derivationally related terms (e.g. “globalizing”). Only substantive mentions were counted, whereas mentions in footnotes, endnotes, and references were excluded. For the “geographic focus” variable, coders were first prompted to determine whether or not an article had a geographical focus and then whether the article had a global focus. Due to these two parameters, articles fall into one of three categories: non-geographic, non-global, and global. ‘Non-geographic’ denotes that the article neither has a geographic focus nor a global focus, ‘non-global’ means that the article has a geographic focus (e.g. regional, national, or local, etc.) but not a global focus. “Global” was coded if the article has both a geographic focus that pertains to global- or world-level processes.

**Covariates**

We compare our two outcome variables with the year in which the articles were published, the first author’s geographic location, and with each other (globally focused articles investigating globalization), and report on the first two in this piece. The only variable to have missing values in our analysis was author’s geographical location. Approximately 50 author values were missing. We note this in the illustrations below.

We conduct an exploratory data analysis on our outcomes and covariates. Specifically, we inspect and visualize the univariate distributions of each of our variables. As a second analytic step, we cross tabulate and visualize our outcomes with each of the covariates. Investigating our outcomes by time and place can help us answer our research questions by telling us when “globalization” or “global became foci in comparative education and where
in the world comparative education scholars are writing about globalization and ‘the global.’

**Limitations**

The most limiting, though also most enabling, feature of our research design is the data. *Comparative Education Review* is just one of several academic journals in the field of comparative education. Even if each volume had been exhaustively coded, the body of knowledge constituting comparative education extends well beyond the confines of this one journal’s published articles.

A second limitation of our study design is the uncertainty of intercoder reliability. As this study was part of a medium-sized course, it was beyond the scope and time constraints to discuss across multiple meetings the problems that arose while coding: any discrepancies and uncertainties were addressed during one meeting. Further, there were no formal counts of coder agreement or statistical tests of consistency in coding (Neuendorf 2002). More specifically related to our research, coding whether an article had a geographic versus non-geographic focus could be particularly prone to inconsistency, as it relied on the coders’ holistic and interpretive appraisal of the article. This means that there might have been more variation in how articles were coded across coders on this measure compared the computer-aided counts for the measure of ‘globalization.’

Another limitation to our particular study of globalization in comparative education is that the integrated coding protocol of the larger research project was designed to address a broad battery of research questions relevant to understanding the field of comparative education as a whole across time — not simply with respect to globalization. What this means is, with the expressed focus on expediency and reducing cognitive load of the coding, a more exhaustive coding protocol could not be developed. Because of this, there are but just two main outcome
variables that we could investigate with regard to globalization. Further to this point, simple counts of “globalization” or measures of “global focus” are themselves limited in representing the qualitative and substantive content of articles. For example, articles examining and theorizing neocolonial regimes and world processes of cultural domination by Western hegemons — in other words, certain flavors of “globalization” left unnamed and therefore uncounted as such — were not observed with our instruments.

**Findings**

In what follows, we illustrate our findings by research question, first focusing on the univariate investigations of our outcomes and then moving on to describe our bivariate relationships.

*Has the field of comparative education shifted to a global focus?*

As we show in Figure 3.2, we find that 71.1% of articles in our study have a non-global (but geographic) focus, 17.6% have a global (and geographic) focus, and 11.3% have a non-geographic and thus non-global focus. Put differently, we find that, by and large, the majority of coded articles in comparative education are focused on a level of analysis below the global or world level.

To observe if and how the field of comparative education shifts to a global frame over time, in Figure 3.3, we show the proportion of articles with the three sets of geographical foci across the period under investigation. There is a slight increase in articles with a global focus from the 1970s to the 1980s and a large increase from the 1990s to the 2010s, from 11% to 33% — a threefold increase. On the other hand, articles with a non-geographic (and non-global) focus have decreased over time, from 20% of articles written in the 1950s to 6% of articles written in the 2010s.
As anticipated in the univariate results, non-global (but geographic) articles remain in the majority, but appear to be on the decline since the 1990s, as the proportion of non-global articles written in the 1990s is 80% while the proportion in the 2010s is 61%. This is the same time frame in which the proportion articles with a global focus experiences an upward trend.

We thus find preliminary evidence that research with a global focus is becoming more prevalent in comparative education, although the majority of articles in the field remain non-global (but geographic) in focus.

Has the field of comparative education responded to globalization?

In Figure 3.4, we illustrate the distribution of CER articles mentioning globalization with two pie charts. Just under a quarter of articles (23%) mention the word “globalization” at all. Within those articles that mention globalization (69 articles in total, pie chart to the right), 27.5% use the word ‘globalization’ only once and 43.5% use the word two to nine times. Only 10.1% of these articles use the word ‘globalization’ more than 30 times. In other words, the vast majority of the articles that mention ‘globalization’ use it fewer than ten times. From these counts, we infer that, in most of the articles mentioning globalization, it was not a main or substantive focus (Figure 3.4).

In Figure 3.5, we show how globalization mentions become more frequent with time. In all of the five-year periods before 1985, the word ‘globalization’ is mentioned in less than 15% of articles in each respective period. Perhaps surprisingly, the five-year period with the lowest percentage of articles that use the word ‘globalization’ is 1975-1979, with none of the articles mentioning globalization. In the earliest period of our study, 1957-1959, 7% of articles mention ‘globalization’. From the 1980s, the use of the word ‘globalization’ in CER articles steadily increases, with the greatest spike occurring between the 1995 and 2000 five-year periods, going
from 21% of articles mentioning globalization to 69% — again, about a threefold increase. From the early 2000s to the late 2000s, the proportion of articles using the word ‘globalization’ hits its peak at 82%. From there, in the early 2010s, the proportion of articles mentioning globalization at first appears to decrease to 42% and then increases to 75% in articles from 2015 to 2016.

Overall, there is a clear, though not monotonic, upward trend in the proportion of articles that mention globalization across the five decades. Moreover, the proportion of articles that mention globalization in more recent years is quite high, indicating that comparative educational scholars approach globalization as an important research focus.

We also investigate where in the world globalization is a research priority by observing the location of first authors and whether the article mentions globalization. As we show in the bar graphs in Figure 3.6 below, globalization does not appear to be the priority of majority of articles published in any region. Yet, when we compare, for example, the percentage of articles produced in Europe mentioning globalization versus the percentage of articles produced outside in what might be termed as ‘peripheral’ countries, we see a substantive difference. Articles mentioning globalization outside the West make up twice the share of total scholarly publications compared to Europe.

Taken together, while our findings provide initial evidence that globalization is not the most prominent issue in articles, they do suggest it is a substantive one across regions — in US & Canada, over a quarter of the research mentions globalization and more than a third in non-Western countries.

Discussion & Conclusion

Just over 50 years after Ulrich wrote of the importance of growing international contact and the ripeness of comparative education as a new field of inquiry to learn about the world
of education and to promote international understanding, the 1998 Western Region meeting of the Comparative and International Education Society (CIES) similarly evoked the promise of globalization as the new horizon of comparative education in their promotional brochure:

Comparative and international education is enjoying a renaissance. Globalization has infused an ever-present need to learn about each other with an urgency and emphasis like no other in history. At the same time, the postmodern attack on meta-narratives and totalizing discourses has infused our scholarship and practice with doubt about much orthodox wisdom. (Quoted in Arnove 2003, p. 16).

This take on globalization is rather consonant with Ulrich’s in the first volume of CER. It also gestures to the epistemological impact that new social scientific theory — or “postmodern attacks on meta-narratives” — is likely to have had on comparative education in the last decades.

Yet, perhaps to temper this optimism, our findings show that research on globalization and a shift in focus to the global level may not be as prevalent in comparative education as one might expect from these accounts. As an answer to our first research question, for example, we found that research in comparative education is primarily focused at a level that is decidedly not global in focus — evidence to suggest that, taken as a whole, the field is characterized by what Steiner-Khamsi (2010) called “methodological nationalism” (p. 324). And, as an answer to our second research question, we found that, while there is a clear upward trend in recently published articles mentioning globalization, the frequencies of mentions in each article are low and suggest that the topic is tangential to the main empirical problem.

Is the field of comparative education keeping up with globalization or is it failing its promise at “Dancing on the Edge” of a truly global horizon (Arnove 203, p. 16)? Is a “global focus,” which we show in Figure 3.1, an analytical lens with actual, empirical traction or better
understood as a theoretical abstraction? The current study is not designed to address these questions, which we nonetheless view as being consequential to our findings. Moving forward, however, we see a couple of clear steps to take to attain a better understanding of the field of comparative education, especially as it responds to contemporary social change in the age of globalization. And, critically, along the way, we also believe these future research directions can bring more evidence to bear on these questions that our findings raise.

**Future Research**

*Future research could be designed to include a broader sample of comparative education literature*

As we outline in the research design section above, our study is primarily limited by its (1) exclusive focus on CER and (2) limited selection of articles within CER. To substantiate our descriptive findings outlined above further, future research designs could incorporate both literature from alternative double-blind, peer-reviewed journals as well as literature from each of the other issues of CER left uncoded in this study. We are confident that our choice of coding just the first issue of each volume of CER would not introduce systematic bias in our findings — there is no reason to believe, for example, that Issue 1 would vary systematically, on average, from Issues 2-3 in a given volume. Yet, more, exhaustive data, especially from a wider swath of alternative research outlets, would still provide a better evidentiary basis to judge whether there is in fact an upward trend in research focused at the global level and in research directly contending with globalization as an empirical problem.

*Future research could be designed to explain observable trends in globalization mentions and global focus*

Our data-analytic strategy was purely exploratory and descriptive — we sought to
observe and describe whether, to what extent, and where the field of comparative education shifts to a global focus and whether, to what extent, and where researchers investigate globalization. Future research could take it a step further and apply a multivariate data-analytic strategy. Some promising questions along these lines might be: Is globalization more of a focus in Europe in the earlier decades compared to the later decades? Put differently, does author origin explain a significant amount of the variation we see in mentions of globalization, and does this relationship change over time? Another question might be whether there is a literal sense of “methodological nationalism” in comparative education: does the research article’s methodological approach predict whether research is focused on the global level or to what extent it investigates globalization? For example, it might be that, compared to qualitative and quantitative empirical reports, essays published in CER more often focus on the global level and investigate globalization. Whether this is observable in the data could go a long way in understanding the ‘theoretical talk’ versus ‘empirical walk’ of the field of comparative education.

Hitherto, taking stock of the field of comparative education often took the form of discursive narrative histories with key citations and critiques of monuments and game changers in the field (e.g. Brickman 1960; Crossley 1999; Steiner-Khamsi 2010; Klees 2008). Other, more empirical approaches to investigating the field have turned to its methods (Rust et al 1999) and developed concrete definitions of what exactly the comparative method is and how it looks in practice in comparative education (Koehl 1977). While inestimably useful in providing orientation in a perhaps otherwise disorientingly pluralistic, multidisciplinary field of both empirical inquiry and normative practice, we find that these accounts of comparative education are wanting in providing empirical, granular definition of the field over time. The present study
is a first step in this direction, offering a sharper view of how the field has responded to the material and epistemological shifts occasioned by globalization.
Appendix 3.0:

Figure 3.1: Analyzing Education without the Global view (Panel A) and with the Global View (Panel B)

Panel A

A typical comparative approach to education with the ontological view of the world as aggregated social phenomena.

N increases proportional to the number of comparative cases under investigation

Panel B

A global approach to education with the ontological view of the world as social phenomena embedded in a global environment
Figure 3.2: Total Articles by Geographical and Global Focus (n = 301)

![Pie chart showing distribution of articles by geographical and global focus.]

Figure 3.3: Percentage of Total Articles by Geographical Focus, Global Focus, and Decade (n = 301)

![Line graph showing percentage of articles by geographical focus over decades.]
Figure 3.4: Percentages of Articles Mentioning Globalization (left) and Percentages of Articles Mentioning Globalization “n” Times (right) (n = 301)

Figure 3.5: Percentage of Total Articles Mentioning Articles Mentioning Globalization by 5-Year Period (n = 301)
Figure 3.6: Percentages of Articles Mentioning Globalization by Region (n = 250)

Figure 3.7: Framework for Comparative Education Analysis (Bray & Murray, 1995)
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CHAPTER 4

An Analysis of the Comparative Education Review Journal:

Topics of Interest in the Field of International and Comparative Education

Barbara Born, Hannah D’Apice, Lisa Overby, Sara Rodriguez
Introduction

Background

International Comparative Education (ICE) is a dynamic field, characterized by continual changes and multidisciplinary approaches. Since its consolidation as a research area in the 1950s, ICE has been characterized by a notable and essential duality: on the one hand, it is a scientific area of study, based on methodological and theoretical approaches; on the other, it is an applied field in which different actors enact educational policies across the globe. These varied approaches are the result, in part, of the plethora of actors examining comparative issues, from scholars and international governmental organizations, to local and national non-governmental organizations (Klees, 2008). With such diversity at its foundation, the passage of time has brought about a variety of shifts in methodological approaches, levels of analysis, and areas of investigation within the field.

Given this complex landscape, how does one define ICE and understand its relevance to educational research? Carnoy (2006) attempts to address the complexity of the field by proposing a cohesive definition of comparative research as that which analyzes tendencies or trends in different contexts. In this view, the field is not defined by a common object of analysis, but rather by a comparative approximation of objects relevant in different periods and distinct contexts. One may additionally note that comparative research has gained in prominence with the rise of globalization. In a more complex and connected world, both policies and trends seem to “travel” from one country to the other, with this movement in and of itself an object of analysis in the field. Indeed, as stated by Steiner-Khamsi (2010), there has been a trend in the field to perform contextual comparison, using approaches and perspectives that encompass the relationship between globalization and contextual issues. Within those large contexts, a profusion
of theoretical approaches are used to interpret different social phenomena.

In studying the state of knowledge in ICE, we found it imperative to seek and observe trends throughout the field’s full temporal existence. Because the field has seen substantial changes in geographic focus, subject matter, and contributors at various points in its short history, any attempt to describe knowledge in ICE must take into account changes across the field’s full 60 years of existence, examining variables and subject matter by time period, be it even by decades or half-decades.

In pursuit of understanding how knowledge in ICE has changed over the past six decades, we seek to investigate what substantive topics have been recurrent over time, as well as what relationships these topics may have amongst themselves. Such inquiry can provide insight as to which elements influence educational policies and trends, keeping in mind Carnoy’s claim that such trends are the focus of investigation in the field. Thus, this research paper aims to investigate trends regarding the substance of scholarly inquiry in the field of ICE from the late 1950s to the present. We use the *Comparative Education Review*, the premiere journal for the field, as our source of data.

Previous meta-analyses have been conducted in separate attempts to investigate how the field has behaved across the last 60 years. Some, like Koehl (1977) and Rust et al (1999) addressed methodological trends in research, as opposed to changes in substance. Little (2000) attempted an investigation of conceptual trends in the journal over time. However, that study limited itself to a 20-year period between 1977 and 1998, using article titles as its analysis sample, the effects of which combine to produce a narrow view of ICE content. There is a need for studies that go across the 60-year history of the journal, and into the content of the articles themselves, in order to understand changes over time in the field’s substantive topics of interest.
Research Questions

In response to this gap in the literature, our study’s research questions focus on the development of the ICE field over time. Through this focus, we seek to observe any changes and trends in the subject matter addressed in comparative education articles between 1957 and 2016. We’re particularly interested in trends in the following subject areas: policy, politics, economics, finance, science, achievement, equality, gender and minorities. The selection of these subject areas was based on certain dominant conceptual frameworks within ICE, including modernization theory, human capital theory, world society theory, dependency theory, postmodernism, and anthropology. We have also integrated our personal experiences and interests as a diverse cohort into selection of our observed variables.

In particular, we ask: “How have mentions of such subjects in Comparative Education literature increased or decreased throughout time between 1957 and 2016?” “Are there any associations between number of mentions of two or more of these subjects in the Comparative Education literature between 1957 and 2016?” We operationalized our variables of interest via frequency of mentions in articles per year, controlling for article length, to be further discussed in the data and methods sections. We therefore examine the frequency of mentions through time for each of our variables of interest (politics, finance, economy, policy, minorities, gender, inequality, science, and achievement), and run correlations between these data to determine the existence, or lack thereof, of linear relationships between the frequency of mentions per page for any two of the nine variables.

As a result of the previously-discussed growth and diversification of the ICE field throughout time, we expect to see:

- **Hypothesis 1:** Rates of mentions per page for each of the nine key terms will increase
over time.

Due to the emergence of dependency theory, which identifies and draws attention to certain national and subnational groups as oppressed and underserved (Noah & Eckstein, 1988), as well as trends elucidated by world society theory, such as the international rise of equality- and rights-based education policy perspectives after World War Two (Ramirez et. al, 2016), we expect to see:

- **Hypothesis 2a**: Rates of mentions per page for gender, equality, and minorities, will increase starting in the late 1970’s and/or early 1980’s

- **Hypothesis 2b**: Rates of mentions per page will be significantly, positively correlated between pairings of the term ‘equality’ with ‘gender’, ‘minority’, ‘achievement’ and ‘policy’

And finally, due to the influence of modernization and human capital theories of education, which link individual development as shaped through education to a nation state’s economic modernization and development (Bernstein, 1971; Hanushek, 2013), we expect:

- **Hypothesis 3a**: Rates of mentions per page will be significantly, positively correlated between pairings the term ‘economics’ with ‘politics,’ ‘policy,’ and ‘achievement’

- **Hypothesis 3b**: Rates of mentions per page will be significantly, positively correlated between pairings of the term ‘achievement’ with ‘policy’ and ‘science’

**Data and Methods**

*Sampling and Data Collection*

Articles for our analysis were drawn from journal volumes of the *Comparative Education Review*, the premiere journal for the field of ICE, as published between 1957-2016.
In an attempt to randomize the sample, we conducted stratified sampling across volumes, selecting journal articles from the first non-special issue for each year were coded. We thus excluded non-article pieces, or articles published as part of special issues. 301 articles in total were coded, with 297 in the final analysis sample, due to four articles from 1971 not being coded for substance variables.

Coding Instrument

Data was collected using a survey with six sections meant to capture essential information of a given journal article. The six sections were developed jointly by the class, with input from professor and teaching assistant, and were entitled as follows: General, Authors, Methods and Analyses, Geography, Level and Type, and Substance. For this study, only data from the General and Substance sections were used. General data relevant for this study included the article’s year published, start page in the journal, and end page in the journal. Substance data included the number of mentions of key terms aligned to each of the following possible topics: politics, economy, society (including gender, minority, inequality/equality), and education (including science, achievement, finance, policy). Specific terms searched included: politic, econom, gender, minorit, equalit, science, achievement, financ, polic. Coders were advised to exclude recorded instances that matched the literal search term, but were not conceptually aligned to the term’s topic.

Method

Using the results from the sample coding, content analysis was conducted to determine the raw number of mentions of the selected key terms in each article. Raw numbers of mentions were summed into 12 five-year buckets across articles and journal volumes. As the data set consisted of varying page lengths per journal article, number of mentions per term were
standardized by page length, resulting in a value between 0.0 - 1.0. This value, in turn, represented the frequency of mentions per single page for each term, per each five-year bucket. We conducted univariate analyses to understand the empirical trends of the incorporation of selected terms in journal articles over time, as well as correlational analyses to understand the relationships between mentions of individual key terms. A total of 9 univariate analyses and 36 bivariate analyses were run, with bivariate analyses tested at the 5% level of significance.

Findings

Univariate findings

Only findings for mentions of equality, gender, minorities, and policy increased over time. Economics, politics, and policy had the greatest frequency of mentions per page over the 60 years (0.70, 0.67, and 0.61, respectively).

[Figures 4.1, 4.2 about here]


[Figures 4.3, 4.4, 4.5, 4.6 about here]

Rates of mentions of politics, economics, science, and achievement had mixed trends over time. As exhibited by Figure 4.3, mentions of politics decreased between 1972-2001,
followed by a dramatic positive spike for 2007-2011. For economics, Figure 4.4 illustrates that the term was the most mentioned between 1971-1996, with its peak during the 1980s. Rates of mentions of achievement steadily increased from 1957-1986, but have experienced an overall decrease since 1992-1996, according to Figure 4.5. Figure 4.6 illustrates that mentions of science decreased between 1957-1991, but have since experienced alternate increases and decreases between five-year periods.

[Figure 4.7 here]

Finally, Figure 4.7 demonstrates that mentions of finance decreased steadily over time, with minor spikes that did not disrupt the overall downward trend.

Bivariate findings

[Figure 4.8 about here]

Equality, minorities, gender, achievement, and policy. Correlational analyses revealed no significant correlations between mentions per page of equality and achievement (p > .05), equality and policy (p > .05), equality and minority (p > .05), or equality and gender (p > .05) at the 5% level of significance. However, equality and achievement as well as equality and policy were found to be significantly, if weakly, positively correlated if examined at the 10% level of significance (p < .1).

Economics, politics, policy, and achievement. Correlational analyses revealed no significant correlations between mentions per page of economics and politics (p > .05), economics and policy (p > .05), or economics and achievement (p > .05) at the 5% level of significance. However, if examining at the 10% level of significance, politics and economics become significantly, if weakly, positively correlated (p < .1).

Achievement, science, and policy. Correlational analyses revealed no significant
correlations between the frequency of mentions of achievement and policy (p > .05) or science and achievement (p > .05), nor was significance found when adjusted to the 10% level.

*Gender and finance, equality and science.* Of 36 bivariate correlations, only two were significant at the 5% level, neither of which were originally hypothesized. According to the correlational analysis, the frequency of mentions of gender and finance are significantly negatively correlated (p < .05), and the frequency of mentions of equality and science are also significantly negatively correlated (p < .05). The negative correlations between both gender and finance and equality and science are found to be high (r > .6), indicating strong relationships. More frequent mentions of gender tend to go with less frequent mentions of finance, and vice versa. Similarly, more frequent mentions of equality tend to go with less frequent mentions of science, and vice versa.

**Limitations**

Several limitations and threats to validity exist within the study design. Sampling was stratified to include articles contained in the first issue of every year, excluding special issues, in an attempt to randomize the sample of journal articles. The resulting data collected do not provide a complete measure of content over time, but a cross-section of content stratified by year. This imperfect process of randomization may reflect some selection bias, presenting a potential threat to generalizability and external validity. Furthermore, bivariate analyses were conducted by calculating the correlations between pairs of variables over time. While each of our variables were continuous and linearly related, they were not normally distributed, but rather likely skewed. This presents a potential threat to statistical conclusion validity.

Our study relied on word counts of specific key terms such as “gender” or “finance” to identify the substance of journal articles. This method of coding journal substance was chosen
because it could be more objectively applied during the coding process, and produced a continuous, quantitative variable that we could then use for statistical analysis of longitudinal trends. However, this limited each substance topic to a single key term, e.g., we counted mentions of the word “gender”, but not of related words such as “female,” “girls,” “male,” “boys,” etc.

A more complete or nuanced list of terms for each substance topic may yield different results. In addition, we selected this study’s 12 keywords to cover a range of substance topics that we considered central to the field of international and comparative education, and where we suspected there may be observable changes in mentions over time as the field has evolved. However, there may remain other critical substance topics not captured by this study.

Further discrepancies that contribute to potential measurement error include the omission of articles from the first issues in 1971, 1973 and 1990, which either were not coded at all, or were specifically not coded for substance. In addition, shortly after coding commenced, it emerged that there was confusion amongst coders about whether to include substance keywords mentioned in the footnotes as well as the text in the word count. While it was agreed that all coders would include keyword mentions in both the main text and footnotes going forward, 22 articles had already been coded excluding footnote mentions of keywords. These errors, as well as instances in which coders conflated terms, were not corrected in the final data set.

Future research could include expanding the sample to include all journal articles for every issue in a given year. Expanding the content analysis to associate substance variables with characteristics of journal authors or readers would help to contextualize the substance of the articles, contributing information not only about what topics are most often covered in the literatures, but also who is producing the research and who composes the audience/consumers (Cook et. al., 2004).
Discussion

Equality, gender, and minorities were not found to begin increasing until the 1990s, as opposed to the 1970s/80s as originally hypothesized. Indeed, until the mid-1970s, these terms were only marginally mentioned in the sample of journal articles. Initial spikes in mentions of minorities and equality before the 1990s were traced to a few select papers in which these terms were overrepresented, and therefore cannot necessarily be said to represent a trend of this time period. The perceived gap between when rights-based education policy perspectives began gaining prominence among practitioners post-World War Two, versus when these terms began appearing more frequently in the CER in the 1990s, may reflect a lag between what is discussed on the ground versus what is explored in academia. However, the consistent increase in mentions of equality, gender, and minorities after the 1990s for these terms aligns with the growing influence of world society theory and postmodern theories, particularly those discussing gender and race.

Aside from these terms, only mentions of policy increased in mentions per page over time, beginning in the late 1990s. This increase may reflect the codification of internationally-coordinated action and policy in the sphere of education, particularly in service of pursuing education as a human right, as exhibited by the Millennium Development and Education for All goals (Mundy, 2007).

As evidenced by the findings, neither economics nor politics experienced steady increases in mentions per page over time. The higher rates of mentions of these topics before 1986 may indicate that the editorial line of the period was focused mainly on discussions influenced by theories of human capital, modernization, and dependency, all of which debate the influence of education and education policy on economic development and power (Fagerlind
& Saha, 1989). Conversely, the decreases and irregularities of mentions of politics and economics coincide with increases in mentions of equality, gender, and minorities. This may reflect shifts in the ICE field towards increased focus on equality and human rights topics, concurrent with slightly decreased focus on economic development.

Interestingly, though economics was the most frequently mentioned term across the 60 years, the related term finance only had an average rate of .11 mentions per page over the same period, and decreased in frequency of mentions overall between five-year buckets. The decrease may signal that issues of education finance have become less relevant at the international level, to become more discussed at the national and subnational levels. Meanwhile, mentions of achievement and science do not show a discernible pattern of change over time. The findings for achievement seem to counter the increased importance of standardized tests and discussion of equity policies, which led us to expect that achievement would show a consistent increase after the 1990s. However, the lack of clear pattern for both terms may be a result of each simply being among the least frequently mentioned key terms across time.

The small proportion of significant correlations found in our analyses speaks to the strength of variability and breadth of the ICE field through time, and may indicate a rise in more narrow and locally focused studies as opposed to theoretical or big picture analyses. Only two pairings, ‘gender/finance’ and ‘equality/science,’ resulted in correlations significant at the alpha = .05 level, both of which exhibited negative relationships. A possible reason for this may be that these terms represent smaller, disconnected spheres of study within the field of ICE. Scholars and articles that tend to be concerned with gender issues may not be concerned with finance issues, and vice versa. Similarly, scholars and articles that tend to be concerned with issues of equality may be less likely to be concerned with issues of science, and vice versa. This may signal a lack of scholarly overlap
between the spheres of these different topics, and a future challenge for the field may be trying to bridge these gaps.

Although we proceed with caution in the following analysis, some correlations with significance at the \( p < .1 \) level support the idea that the field of ICE is shifting towards increased focus on equality and human rights topics, and slightly decreased focus on economic development. Of the six correlations significant at \( p < .1 \), four involve the term ‘equality’. This is particularly compelling when considering that mentions of ‘equality’ are dwarfed by mentions of the three most frequent terms (‘economy’, ‘politics’, ‘policy’), appearing with less than a third of the frequency of each of the latter three. The topic of equality may be assuming a moderately influential role in the field of ICE, and such influence may indicate that the field of ICE is becoming less influenced by economic development and financial growth, and becoming more influenced by equality and social justice. It may also imply that scholars have begun to conduct more work through the lens of education as a basic human right.

Finally, we observe a \( p < .1 \) level positive correlation between the terms 'economics' and 'politics.' Although this warrants caution, as both terms are among the three most frequently mentioned, this could be an indication that the field still shows interest in applied economic development issues despite aforementioned potential shifts in focus, and that human capital and modernization theories have been and will continue to be present in ICE.

**Conclusion**

The overall intent of this study was to analyze how the substance of research in the ICE field has evolved over time. As our source of data, we used articles from the field’s flagship journal, the *Comparative Education Review*, covering a span of 60 years, from 1957-2016. While our study contributes to existing knowledge of longitudinal trends in the topics addressed in the
ICE literature, its limitations prevent us from confirming any broadly generalizable conclusions. Rather, our analysis provides insights on how subject matter has changed over time and identifies relationships between different topics that serves as a basis for a more comprehensive analysis of the evolution of the substance of ICE research. Future research could include expanding the sample to include all journal articles for every issue in a given year, or expanding the content analysis to associate substance variables beyond those we selected.

The data show that the topics of research in ICE continue to expand. Relatively new substantive topics in education research such as minorities, gender, and equality have received increased attention since the 1990s, while more established topics such as economics remain popular, in spite of experiencing some decreases in frequency of mentions. The frequency of mentions of politics, policy, and economics in our analysis highlights both the multidisciplinary and applied nature of the field. We also note a potential transition in ICE research from an emphasis on social science topics such as economics and finance, towards social and cultural issues such as equity and the rights of minorities. In terms of theories, our results do not suggest that modernization and world society theory are less relevant than believed. Rather, this may indicate that these theoretical lenses will adapt and be applied to growing set of rights-based issues.

Thus, the flexible borders of the field position it well to identify emerging issues and challenges in education, increasingly among vulnerable populations and marginalized groups, while the multi-disciplinarily at the core of international and comparative education increases the theoretical and practical opportunities for understanding and addressing them.
Appendix 4.0: Figures

Figure 4.1:

Figure 4.2:
Figure 4.3:

![Graph of politc_mentions](image)

Figure 4.4:

![Graph of econom_mentions](image)
Figure 4.5:

![achievement_mentions](image1)

Figure 4.6:

![science_mentions](image2)
Figure 4.7:

![Graph showing financ_mentions]

Figure 4.8:

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* p < .1 ** p < .05  
Negative correlations are in parentheses
Appendix 4.1: Relevant Section of Coding Instruments

INSTRUCTIONS

Data collection: Download your assigned articles and “back matter” or “contributor information” sections (maybe print out the latter for your two issues). Within an issue only code research articles, research notes, and theory building essays. Do not code introductory statements, presidential letters, editorials, movie or book reviews, and so on. If you are having trouble downloading the sections you need or are uncertain of whether to code a certain article, please ask.

Coding: Start by reviewing the coding scheme. This will make coding faster. We find it works best to skim the entire article, then answer the questions, returning to the article to respond as needed. You can move forwards and backwards through the survey, answers are not final until you hit ‘submit’ at the end. Even after you hit submit, you can contact us if you find you want to change a response. It should take approximately 20-25 minutes to code each article. In two instances you will have to go outside the article for information. 1. “N. citations” is available by entering the title into google scholar, instructions below. 2. The “Author” section information is available in the ‘back matter’ or ‘contributor information’ section of your issue.
### SECTION 1. GENERAL

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Number of citations (Paste the full article title into the following link and enter the number after the "Cited by" term at the bottom of the entry: [https://scholar.google.com](https://scholar.google.com). If no entry is found, type -88)
### SECTION 6. SUBSTANCE

Search each term in each document by going to ‘edit’ then ‘advanced find’ and looking at the number of instances that appear. Do not check ‘whole word’ or ‘case sensitive.’ Skim the instances quickly and exclude ones that don’t fit (e.g. FOR "polic" – we want policy and policies, not police; for minorities, we want historically marginalized groups, not a discussion of amount in some other context.)

**Politics.**

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**Society.**

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**Education.**

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<td>Achievement. &quot;achievement&quot;</td>
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<tr>
<td>Privatization/Private Schools. &quot;privat&quot;</td>
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References


*Comparative Education Review, 48*(2), 123-149.


Chapters 1 & 2.


*Economics of Education Review, 37*, 204-212.


*Comparative Education Review, 21*(2/3), 177-194.


CHAPTER 5

An Analysis of the Comparative Education Review Journal:

Is there a “Gender Gap” in International and Comparative Education in Research?

Raquel Coelho, Gabriela Gavrila, May Khoo, Pamela Mendoza
Introduction

As we set out to assess the state of knowledge in International and Comparative Education (ICE), we suspected there might be a ‘hidden’ gender gap in the current academic research output, with possible implications for the future direction of the field. This idea was substantiated by a literature review of authorship trends observed in related fields, which is summarized in the next section. To test the gender gap hypothesis, we conducted a cross-sectional analysis of authorship trends in one of the most prominent ICE journals over a period of time spanning almost 60 years. The key research questions underpinning our analysis were as follows: (1) What is the proportion of female versus male authors contributing to the articles from 1957 to 2016? (2) How does women authorship change over that time period? and (3) Does the citation rate vary by gender, and are articles authored by women cited more or less?

While there are multiple lenses through which we could have examined ICE authorship for this project, we believed our biggest contribution to the state of knowledge could be made by focusing on the potential gender gap in ICE knowledge production, an idea which had not yet been raised or explored by scholars in this field (although other fields have grappled with and acknowledged similar gender gaps of their own). Future analyses may want to investigate correlations between authorship and institution affiliation, or between authorship and geography. These alternative approaches are valid, and could potentially provide interesting insights into the field of ICE but each of them is a subject for a separate paper; in fact, we expect some of these hypotheses may have been broached by our colleagues in their respective reports. In the interest of brevity, this paper will explore ICE authorship solely through the gender gap lenses, and we hope that our findings can provide some helpful evidence regarding this particular
disparity.

**Literature Review**

The academia has long been dominated by men, with women’s roles being restricted mostly to consumers rather than producers of knowledge; yet in the past century – and increasingly so in the last few decades – the gender gap in higher education is becoming narrower, with young female researchers increasingly outperforming young male researchers (van Arensbergen et al., 2012). Furthermore, since female students currently outnumber male students at all levels of education and in most university subjects (except the STEMs), it is conceivable this might lead to redefinitions of many traditional or emergent academic fields where the global discourse was previously driven by male academics, including that of ICE. This is a natural process to be expected in the industry of knowledge creation; academic fields such as ICE regularly undergo “thematic shifts” in response to changing demographics and fluctuations in the perceived priorities of their constituencies (Cook et al., 2004).

Gender authorship, and other dimensions of author diversity, have profound implications for the development of a given field, concerns in that sense stemming both from an equity and an epistemological perspective. On the equity side, the gender gap in research can be seen as replicating and amplifying the tenure and pay gaps experienced by female professors, since research productivity is highly prized and the main entry way into the academic world (Aiston and Jisun, 2015). Exploring this correlation, some authors have warned about over-emphasizing family-related variables on research productivity, which may be drawing attention away from structural discriminatory practices against women in the academic profession (ibid). Other studies have linked limited research productivity with the “clustering of women around junior faculty positions,” implying that the existence of second-tier academics confirms that the
famous ‘glass ceiling’ is still endemic to many academic fields (Feramisco et al., 2009, Matthews and Andersen, 2001). What these arguments have in common is a desire to expose the research productivity gap between male and female academics as a symptom of wider inequalities in society, in the hope that acknowledging the disparity is a first step to eliminating it down the line.

Yet there is another, less obvious, argument embedded in this line of inquiry. Not only is it ‘fair’ to extend academic research opportunities to women in the name of gender equity, it is also ‘efficient’ from an epistemological point of view; simply put, when women are allowed to join in and contribute to the epistemic communities that make up the academic world, the knowledge base broadens significantly and the society as a whole wins. For instance, when discussing the “gender gap” as a primarily political phenomenon back in the 1980’s, one researcher extrapolated this idea to peace research and noted a possible “difference in emphasis” between men and women researchers, before concluding that “dialogues between women and men researchers operating with different theoretical models would be productive for the field of peace research” (Boulding, 1984). One can imagine that might be true in other social sciences, including international relations, sociology or economics, all of which have a direct line to theoretical developments in ICE; therefore, women authorship trends in these fields deserve a closer investigation, and have in fact been analyzed in that light recently (West et al., 2013, Maliniak et al., 2013).

In conclusion, this discussion ties back directly into our main research questions. For instance, the first question (“What is the proportion of female versus male authors contributing to CER articles from 1957 to 2016?”) is meant to paint an overall picture of gender authorship in ICE, and ascertain whether a gender gap does indeed exist in this field, while the second
question (How does women authorship change over that time period?) explores whether the gap is expanding or narrowing. This also begs another related question, whether women academic are actually conducting less research in ICE, or just being published less in ICE journals; while this is an important point and some studies in the literature have made this distinction for other fields (van Arensbergen et al., 2012), this was beyond the purview of our project because of the original design of the study, so we will not be able to answer this question. Finally, one could distinguish between research productivity (as measured by number of publications) and research prestige (as measured by number of citations); this nuanced understanding of research authorship was explored in one study that looked at the international relations (IR) literature (Maliniak et al., 2013). We also added this dimension to our project in order to give a more accurate position of female versus male authors in the CER journal, hence our third research question (Does the citation rate vary by gender, and are articles authored by women cited more or less?)

Data & Methods

As mentioned previously, the data for this study was collected from a prominent ICE journal, namely the Comparative Education Review (CER). We coded the research articles, research notes, and theory building essays for each first issue of the journal from 1957 to 2016, which made up our “representative sample.”\footnote{If the first issue of the year was a special issue, the next issue was used for the representative sample.} The coding document was divided into seven sections: general information, authorship characteristics, methods and analysis, geography, level and type of education, substance or content, and final thoughts/special notes. In this report, we will focus solely on the authorship section, which included the following variables: number of authors, gender of authors, institution name, institution location (country), and institution type.

The final sample comprised 301 articles from 58 years; there were two years (1973 and
which did not get not coded, therefore those have been excluded from our analysis. For this report, we were most interested in the “gender” and the “number of citations” variables which were analyzed in conjunction with the number of authors. In the original dataset, each gender variable had four possible values: 1 if the author is a male, 2 if the author is a female, 3 if the gender is unknown, and 99 if it was a missing value. However, if the gender was deemed as “unknown”, we recoded that as a missing value in order to calculate the total numbers and the relative share of male versus female authors. In conclusion, the overall number of authors was 213 males and 61 females for first author, 41 males and 28 females for second author, 17 males and 5 females for third author, 4 males and 3 females for fourth author, and 1 male and 1 female for fifth author.

To estimate the number of citations per article, the coding protocol required coders to paste the full title of the article into Google Scholar and thus obtain the number of citations which was recorded in the dataset. In the end, this variable had 11 missing values, so we went back to those articles, re-did the steps and were able to replace the missing value with the correct number. For both the gender and number of citations variables, we could visually pinpoint some obvious outliers but we decided to run the analysis including all the observations.

To measure the proportion of female and male authors contributing to articles from 1957 to 2016, we limited our analysis to only include first, second, and third author. For articles with more than one author, we considered each author gender as independent observations and we did not weigh them; we simply counted the number of all male and female authors in the sample.

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8 We used Stata to run the analyses for this study
9 The variable first author gender has 27 missing variables, second author gender has 10 missing values, third author gender has 6 variables, fourth author gender has 2 missing values, and fifth author gender 5 has 3 missing variables.
and divided the sum by the total number of authors in the sample. For the second research question related to the change of women authorship over time, we calculated the number of female and male authors for each year, including all author ranks (first, second, third, fourth and fifth). For the third question, we looked at first authors only, together with the corresponding gender and number of citations per article in order to run the descriptive statistics. For contrast, we included total and average number of citations for female and male authors. Lastly, we used a t-test to compare the average of number of citations per article between female and male first authors (the results of which are reported in the next section).

**Findings**

Several findings stand out in response to the main research questions posed by this study. An overview of the gender of authors for all articles coded show that male authors are overrepresented at 74% of total authors, almost three times that of women authors. Breaking down authorship between first, second and third authors (Figure 5.1), despite an almost equal distribution (41% vs. 59%) of female and male authors as second author, it appears that men still outnumber women as first author (22% vs. 78%) and third author by over threefold.

Addressing the second research question on how women authorship changes over time, Figure 5.2 shows there is an increasing greater number of women publishing articles in the field from the mid-80s until present. The graph clearly illustrates the very low representation of female authors, with either only 1 author or none at all each year, up until 1986 when there is a definite spike, followed by a more stable yet unmistakable rise in numbers since then. Prior to the most current year, men clearly dominated the field, with a share of 2 to 11 times the number of female authors each year. Whist there is a relative decrease of male authors in mid-90s to early 2000s, the number of male authors is still twice that of female authors over that time. Discounting the
sharp decline in the number of female authors in year 2002, the progressive growth of female authors publishing is apparent from 2003 onwards. However, the proportion of male authors still exceed that of female majority of the time. It is only in more recent years (since 2010) that the gap begins to close.

As a complement to the findings above, we also observed a narrowing gap between the number of first authors (male and female) over time, particularly from mid-80s onwards. From 1957 until 1985, there is only 1 female first author at most each year. As shown in Figure 5.3, there is a somewhat intermittent surge of first female authors in alternate years from 1986 onwards. Then from 2000 to present, it appears that the difference in the proportion of female first authors compared to male first authors narrows considerably. Most recently, as demonstrated by the definite spikes in 2013 and 2015, women seem to be publishing more than ever as first authors, catching up and at times even exceeding the number of male first authors. While the general trend is that the number of male academics publishing as first author seems to be decreasing over the decades, the opposite is happening to female academics, but at a slower rate.

In addition to the first two research questions, we also wanted to assess the impact of gender on citation rates for the same sample of articles. Comparing the descriptive statistics for male and female authors outlined in Figure 5.4, it follows that articles written by female authors are being cited approximately 20% more on average than those of their male counterparts. However, the overall citations of articles published by male authors by more than 3 times, consistent with the number of all male authors over all female authors concerned in the study. A summary of the citation figures is included in Figure 5.4.

We also ran a t-test in Stata to compare the average citation rates for the two populations
of interest (male versus female first authors). However, we were only able to reject the null hypothesis (that the difference between the true means of male vs. female citations is zero) when we considered one-tailed p-values for the alternative hypotheses (mean difference < 0), so our conclusion is very modest at best in that regard (see Stata output in Figure 5.5).

**Limitations**

Among the limitations of this study, the one that stands out most in terms of article coding was the inability to identify individual authors because their names were not recorded in the coding document. It is therefore conceivable that some authors may have been double-counted if they authored articles in multiple years, and the gender ratio may be skewed slightly as a result. By identifying individual authors in future research design, this pitfall can be avoided; also, the additional information would be useful in order to ascertain the recurrence or prominence of certain authors (male or female) during a given period of time.

Without confirming the identity of the authors, there is also a risk of miscoding gender due to the inability of coders to distinguish male names from female names, particularly for people whose ancestry they are not familiar with (coder background becomes important). Although front and back matters, when available, were helpful at indicating the gender of authors using pronouns as identifiers, there is a lack of assurance of this when neither ‘he’ or ‘she’ is used in any description of the background of the authors. This limitation could be overcome in the future by accurately and uniquely identifying authors.

Another limitation of the study is that there are over 20 coders involved instead of one or a small group of people, so inter-coder reliability may be low. In addition, the guidelines for coding were streamlined after the initial stage of coding, however those who had already coded were not able to revisit their articles and recode to align the data. By the time the dataset was passed
on to our research group, recoding had not been done for all articles to confirm the previous changes had been incorporated. In the future, this pitfall could be minimized by a retroactive unification of guidelines and having less coders involved in coding of the articles.

Finally, since this study relies on a sample of articles from only one journal in the field, results may not necessarily be generalized to the overall field of ICE. Despite CER being commonly considered as one of the prominent peer-reviewed journals in ICE, it is unavoidably U.S.-centric (with most authors being based in North America or Europe). By including alternative journals from around the world, we may find that the hypothesized gender gap in ICE research is not necessarily as apparent elsewhere. However, in order to achieve such diversity of views, it may be necessary to code articles published in foreign languages, which is not an easy task. Finally, the exclusion of special CER editions from this study might also affect the reported proportion of male and female authors, leading to misleading results. In conclusion, to strengthen the findings reported in this study, we recommend including alternative ICE journals around the world, and/or expanding the sample to include more editions of the CER.

Conclusion

For this paper, we conducted a cross-sectional analysis of authorship trends in the CER, a journal chosen specifically for its prominence to students, scholars, and fellows in the field. The data showed that, overall, there are more male authors publishing in this journal than female authors; indeed, from 1957 to 2016, women comprised only 22% of the total sample of authors. However, the proportion of female versus male authors contributing to articles increased in the period of time studied: from 8% of the total sample in the decade between 1957 to 1967 to almost 40% between 2006-2015. The percentage of female first-authors in the journal also increased over time: in 1957-1967, female first-authors wrote about 3% of the articles in the sample, yet
in the past decade, female first-authors wrote about 45% of articles.

These findings are aligned with similar research on gender diversity and productivity in other academic fields, and provide some hopeful evidence that gender differences in publishing are narrowing. Although there is still a higher male predominance in publications in many academic fields, our data suggest that females in ICE have made substantial strides in the past decade. A possible explanation for our findings comes from research on gender gap in higher education, that has found that women are, with few exceptions, entering academia at a higher rate than men. This may be indeed be the case for ICE, as researchers have found that the field has seen an influx of women in the last decade (Cook et al., 2004).

When we looked at citations, the results were more favorable toward women authors. We found that articles published by women were cited at a higher rate (20% more on average) than those published by men. Although aggregated citation rates for male authors exceeded by three times the citation rates for female authors, those findings reflect the higher proportion of male versus female authors concerned in the whole sample. It is interesting to speculate on possible reasons why women are being cited at a higher rate than their male peers. It is possible that this might be related to the subjects they approach or the angles they take on different subjects.

The current study has several strengths. First, it collected information on authors using official information from the CER journal, enhancing the probability that authors’ gender was correctly identified. In addition, the longitudinal design allowed for the assessment of authorship trends over a large span of time (almost 60 years). Third, the sample was sufficiently large (n>300 articles), increasing the confidence in the results of the study.

But in a sense the study was also limited because we did not code the author’s names, so it is possible that the same author was counted more than once. Another limitation of the study
is that the articles were coded by a large number of people, raising questions about inter-rater reliability and increasing the probability of error measurement. Moreover, only one journal, published in English, was selected for the study. Articles published in other journals and potentially written in foreign languages were excluded from this analysis, and they may well paint a very different picture of the field. Finally, given the design of our study, we were unable to assess possible factors behind the observed authorship trends in the CER journal.

The implications for this narrowing gender gap in ICE research are potentially significant. If productivity, measured by publications, and impact measured by citation rates, are indeed as important as the literature suggest for advancement in an academic field, we should expect to see more female ICE scholars being promoted in the coming years (decades), or at least getting tenure at a comparable rate with their male peers. In addition, we could also expect to see the salaries of those female academics catching up with those offered to male counterparts.

All things considered, the findings of this study, although modest, do suggest some useful directions for additional research to improve the understanding of gender diversity in publication and academia. Most importantly, further research should expand our study to cover additional journals in the field of ICE; secondly, it should aim to investigate whether different journals display different gender trends so considering not just the aggregate numbers but also differences between journals. Thirdly, it would be interesting to link our findings to gender research gaps in other fields, and whether the magnitude of the gap observed is particular to the field of ICE or consistent with trend in related fields (IR, sociology, etc.). Last but not least, more work is needed to expand on our citation analysis in order to offer more nuanced conclusions, particularly by linking citations, gender, and the actual topics studied.
Appendix 5.0:

Figure 5.1: Distribution of Male and Female Authors

Figure 5.2: Male vs. Female Authors Over Time
Figure 5.3: First Authors (Male vs. Female) over Time

Figure 5.4: Citation Statistics based on Gender of Authors

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</table>
Figure 5.5: STATA Output

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\[
\text{diff} = \text{mean(1)} - \text{mean(2)}
\]

\[
\hat{\sigma} = 1.4653
\]

No: diff = 0

\[
\text{degrees of freedom} = 272
\]

\[
\begin{align*}
\text{Ha: diff < 0} & & \text{Ha: diff != 0} & & \text{Ha: diff > 0} \\
\text{Pr}(T < t) & = 0.0740 & \text{Pr}(|T| > |t|) & = 0.1495 & \text{Pr}(T > t) & = 0.9252
\end{align*}
\]
References


CHAPTER 6

An Analysis of the Comparative Education Review Journal:

Educational Privatization in the Field of Comparative Education

Silvana Freire, Angela Hardy, Joe Kim


**Introduction**

In the 60 years since the field of International Comparative Education (ICE) became professionalized, scholars have reflected on its changing landscape (Arnove, 2003; Brickman, 1960; Crossley, 1999; Noah, 1984). ICE is a field known for its breadth: it employs all social science disciplines, embraces a number of methodological approaches and theoretical frameworks, and engages a variety of actors such as scholars, policymakers, practitioners, and recipients (Bray, Adamson, & Mason, 2014; Klees, 2008). This latitude allows for a unique flexibility and responsiveness in developing a body of knowledge that reflects constantly evolving educational issues. However, the degree to which academic scholarship in the field has directly reflected global educational trends is unclear.

Only a handful of empirical studies have attempted to survey the field of international and comparative education (Cook et al., 2004). Some of these studies have surveyed practitioners (Ross, To, Cave, & Bair, 1992), others have analyzed course content, and still others have investigated trends in the literature (Cook et al., 2004; Rust, Soumaré, Pescador, & Shibuya, 1999; Wolhuter, 2008). In a survey of *Comparative Education*, Little focused on changes in theoretical frameworks and connections between comparative education and development studies (Little, 2000). Two other literature surveys conducted content analyses of data sets pulling from three major journals in the field of international and comparative education: *Comparative Education Review* (CER) (1957-1995), *Comparative Education* (1964-1995), and the *International Journal of Educational Development* (1981-1995), both focusing on methodology and internal characteristics rather than comparing content in the articles to global trends on the ground (Koehl, 1977; Rust et al., 1999). To our knowledge, only Wolhuter’s analysis of CER articles from 1957-2006 and Raby’s analysis on CER bibliographies from the
same period focus heavily on a variety of topical or thematic concerns (Rosalind Latiner Raby, 2007; Wolhuter, 2008).

None of these studies focused on debates of public versus private education, leaving the degree to which privatization has been a central focus of comparative education scholarship an open question. The scarcity of information on trends in how the debate over privatization has been addressed by the academy is unfortunate, given that the topic of private sector engagement has received sustained and lengthy attention among policy-makers and international agencies (Menashy, 2012).

**Research Question**

We ask the following research question: To what extent does the body of knowledge in ICE reflect historical and regional trends in the prominence of public and private education? To investigate this question empirically, we analyze a subsample of articles from *Comparative Education Review* (CER), selected because it is the dominant publication in the field and its articles reflect the diverse nature of the field itself (Nordtveit, 2016). In our longitudinal analysis that maps content of CER from 1957-2016, we pose the following hypotheses:

*Hypothesis 1:* CER literature will show a greater emphasis in public education during the sixties and seventies, as a reflection of the establishment of new educational systems in recently developed nations.

The emergence of the welfare state, responsible for providing education to all citizens, drove the idea of a publicly funded educational system during this period (Rizvi, 2016). After World War II, the need to create a new world order and the emergence of newly established nation-states encouraged the expansion of public schools and mass education worldwide (Chabott & Ramirez, 2002; Meyer, Ramirez & Soysal, 2008; Murphy, 1996). Newly
decolonized nations from the developing world tended to believe that public education was essential for their national development (Rizvi, 2016; Van de Walle, 1989) and thus were drawn into the expansion of mass education influenced by the world models (Meyer, Ramirez and Soysal, 2008). As a way to explain public’s education rise during the 1960s and 70s, Carl mentions that comparative research has relied on perspectives of state formation, the formation of national identities, and the rise of the western cultural frame to create a new form of social organization (2009).

**Hypothesis 2:** CER literature will show a greater emphasis in private education starting in the 1980s, as a reflection of the worldwide privatization movement that gained momentum during this era.

In the late seventies and beginning of the eighties, the widespread discontent with public sector provision of services led to the appearance of the *modern privatization movement* (Murphy, 1996; Pedró, Leroux, & Watanabe, 2015; Van de Walle, 1989). Governments in the United Kingdom and the United States adopted the model of education privatization, under the idea that it would lead to greater efficiency and effectiveness in the provision of education (Rivzi, 2016). The privatization model is based on neoliberal ideas about economic development (Klees, 2008). Multilateral and international organizations such as the World Bank began heavily promoting a set of policies and practices for developing countries (Burch, 2009; Mundy, 1998) in which privatization of education was included as one of the main emphases of a global development agenda (Alexander, 2001; Mundy & Menashy, 2012; World Bank, 1995). As reflected by the global increase in the rates of student enrollment in private institutions \(^\text{10}\), we

\[10\] Statistics reported by the World Bank and UNESCO Institute for Statistics (http://data.worldbank.org/indicator/) show that primary and secondary enrollment rates in private institutions have increased. Primary enrollments went from 9.6% in 1970 to 12.9% in 2013; while secondary enrollments
expect to see an increase in the number of articles with a focus on private education during this period, as well as an increase in the mentions of privatization.

In developing our hypotheses that research published in CER would reflect the historical trends in the prominence of public versus private education, we turn to the established goals of the journal published in its inaugural issue. William Brickman, then president of the Comparative Education Society (later the CIES), wrote that the journal would be comprised of “up-to-date information and interpretive analysis of educational developments and problems all over the world” (Brickman & Bereday, 1957). CIES presidential addresses over the decades have continued to emphasize the role of CER in reflecting global trends (Arnove, 2001), and the connection between current debates in the field and scholarship in the journal is a contemporary emphasis. In a statement of policy to authors interested in submitting their work, CER currently states that “as conditions in the world and our own field continue to develop and change”, they seek submissions that contextualize topics within broader debates and delve into major issues with significance for policy (CER Website).

We also turn to a past study that established links between socio-cultural, political, and economic trends and the body of knowledge in ICE literature. Wolhuter conducted a content analysis of 1,157 articles published in CER from 1957-2006 and found that the thematic focus of the journal shifted over time in response to the political and societal landscape (2008). For example, early volumes of the journal reflected a peak interest in the Soviet education system heightened by the launching of Sputnik and Cold War concerns of educational competitiveness. In the post-apartheid era, South Africa received a great deal of attention (Wolhuter, 2008).

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got from 19.25% in 1998 to 22.96 % in 2013.
Data & Methods

Data were drawn from 301 articles from the *Comparative Education Review* (CER), which is widely regarded as the leading journal in the field of international and comparative education (ICE), and is “ideally suited for journal analysis aiming at identifying the foci of and trends in the field of comparative education” (Wolhuter, 2008). In order to map the state of academic knowledge in ICE over time, articles (excluding introductory statements, presidential letters, editorials, movie and book reviews) from the first issue of each year’s publication from 1957 to 2016 formed the sample for this study.

Coders consisted of 27 graduate students enrolled in an “Introduction to Comparative and International Education” course at a private university located in the US. Data collection took place in October 2016. Each coder was assigned two journal issues to code, following a coding scheme developed collaboratively by the class. Coders took approximately 10-15 minutes to analyze each article. In our study, we analyze results from sections of the coding scheme relevant to our research question: frequency of focus on type of education (public, private, and other)\(^{11}\), mentions of privatization, and geographical focus of articles.\(^{12}\)

Findings

Analysis of our results begins with a look at the number and proportion of articles that had an explicit focus on type of education (i.e. public, private, or other) over time. Of the 301 total articles coded by the students in the course, our analysis sample consists of the 61 that were identified as having type of education as an explicit focus. Using this analysis sample that

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\(^{11}\) The category of ‘other’ was interpreted by coders in a variety of ways, with write in responses that included: vocational, minority schools, and religious. See limitation section for further discussion.

\(^{12}\) See appendix for a list of questions.
represented only 20% of the original sample size, we set out to illustrate the proportion of articles with a focus on a specific type of education (public, private, or other) over time.\footnote{Articles with an explicit focus on more than one type of education were taken into account accordingly}

Even though our results indicate that academic discussion surrounding public education was indeed prominent during the decolonization period of the 1960s and 1970s, supporting our initial hypothesis, educational discourses on public education remained somewhat consistently a focus over time. Indeed, the focus on public education peaked in the contemporary period from 2010-2016. Contrary to what we had expected, during the 1980s, a period of increased movement toward privatization advanced by neoliberalism, the literature remains more focused on public education or other types of schooling. Interestingly enough, the push for privatization by multilateral organizations and governments in the 1970s and 1980s (Klees, 2008; Rivzi, 2016) does not seem to coincide with a similar heightened attention toward private education by the academy, as Figure 6.1 suggests. Taken together, these findings appear to demonstrate a longstanding emphasis on public over private education in comparative education literature. Only in the first few inaugural years of the publication was the focus on public and private schools evenly distributed.

Our analysis continues by looking further in-depth at discussions of privatization in CER, charting how the frequency of mentions of privatization and private education has changed from 1957-2016. Our results in Figure 6.2 show that the average ratio of mentions (i.e. # of instances in which “privat” appear in the article) per page peaks in the 1960s before rising to its highest point in the 2000s. A similar trend can be seen when examining the proportion of articles that contain at least one mention of “privat”. When looking at trends between articles that focused on private education and the ones that mentioned privatization, we can see that the only period of time where...
these trends seem to match is during the 1960s.

Our findings conclude with a look at geography, specifically addressing the question of whether or not articles with a regional focus mention privatization at least once. Figure 6.3 shows that for every region except for Central and Eastern Europe, the number of articles that mention privatization is the same as or greater than the number of articles that do not mention privatization. Looking at regions such as East Asia and the Pacific, Latin America and the Caribbean, and the Arab States, where the proportion of articles that mention privatization is slightly higher, we cannot find an obvious trend that could help as link the appearance of privatization notions in the literature with political or economic trends of that region. For example, in the case of the Arab States, although 10 out of 13 articles did mention privatization at least one time, none of those articles had an explicit focus on private education. Although the percentage of articles that mention privatization at least once seems high in East Asia and the Pacific (60%) and in Latin America and the Caribbean (70%), the proportion of articles with an explicit focus on privatization are only 18.2% and 50% respectively.14 Only the case of Central and Eastern Europe, a region under Soviet rule (and consequently, a predominantly public education system) for the large majority of the 20th century, provides support to our original hypothesis that academic scholarship in the field of ICE and global trends are, to some degree, linked.

Limitations

This section addresses the key limitations in our study which could threaten the internal and external validity of our findings. First, the small size of our sample of analysis that contains only the first issue of each year from one particular journal (CER) could constrain the generalizability of our findings to the whole ICE field. For instance, our finding that 50% of the

14 In the case of Latin America, our sample contained 6 articles, 3 of which had a focus on private education
articles written about Latin America and the Caribbean have a focus on private education is based on a sample size of 6. Alternative studies should consider comparing some of the 32 other journals in the field (Wolhuter, 2008), as well as other sources of knowledge in ICE, such as published books, conferences or interviews with former presidents and members of the Comparative and International Education Society. Additionally, a comparative analysis between applied research presented in reports from International Organizations such as the World Bank or UNESCO and theoretical scholarship in the field could be illuminating in understanding the evolution of privatization debate in comparative education.

Second, measurement error due to the coding process might present reliability issues in our findings. Data coded presented some inconsistencies probably because coders had different understandings of what private as a type of education means, or which other types of schooling could fall in the category “others”. Write-in responses by coders that specified “other” types of schools included responses that more appropriately fell into either the public or private category, making this measure inconsistent. Future studies could conduct inter-rater reliability checks. Also, the coding protocol could incorporate detailed examples of what should fall in each category.

Finally, we found some problems regarding the number of mentions of “privat”. On the one hand, more guidelines were needed about what should be considered in the counting process and emphasize the importance of checking if the word was related to the concept of private education. Due to this limitation, we think there is an overestimation of the focus in

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15 One coder, for example, noted for a particular article not included in our analysis sample that “The substance code "privat" occurred 12 times, but it related to "private rate of returns", not to private schools or privatization, so [I] didn't include [it].” Depending on the extent to which the diverse group of coders followed similar protocols, our results are potentially skewed by mentions of the code “privat” that do not align with the construct being researched.
private education when looking at the total number of mentions. In order to account for this, we suggest considering if the article mentions at least once the word “privat”. On the other hand, since the scope of the research was “type of education”, one should consider counting mentions of other concepts, such as “public”, that could possibly be related to this topic.

**Conclusion**

The purpose of this article has been to assess the body of knowledge produced in ICE concerning public and private education in the past 59 years, as measured by publications in CER. We began our research with the conjecture that the prominence of public education in the 1960s and 1970s would yield a greater number of articles with a focus on public schooling and that the rise of neoliberalism in the 1980s would be reflected in the journal with an increase in coverage of private schooling and privatization. However, our results showed no such trends. In attempting to understand these findings, we explore two potential explanations. First, perhaps the field of ICE is simply so broadly defined that we should not expect to find that trends in the content of its articles are proportionally related to historical trends. In a 20th anniversary issue of CER, editor Andreas Kazamias and Karl Schwartz called the content of the journal a “variegated mosaic,” expounding that, “there is no internally consistent body of knowledge…Instead, one finds various strands or schools of thought, theories, trends or concerns, not necessarily related to each other” (Kazamias & Schwartz, 1977, p. 151). This eclecticism is not limited to CER, but seems to be a characteristic of other journals in the ICE field (Cook et al., 2004). Speaking on the types of articles found in Comparative Education, the British counterpart of CER, Angela Little says “[they] cover a very broad range of context, content and comparison. (...) breadth has the considerable advantage of bringing together readers with different and shared foci (...) but has the disadvantage of dilution and loss of
focus for a field of study” (2000, p.285). The lack of connection between our findings and historical and regional trends could be a function of the heterogeneity of the ICE field.

In our second explanation, we posit that the lack of direct connection between the prominence of public or private education in the field of comparative education and the topics of academic scholarship published in CER may be a function of the distinction between education discourse in the theoretical field and its more applied counterparts such as development studies and policy analysis. Indeed, scholars have noted that trends over time in emphasizing public or private education are more closely related to development discourse than to empirical scholarship produced by the academy (Chabott & Ramirez, 2000). A recent study analyzing the production of knowledge on the education privatization debate by the development field supports this observation. A group of researchers conducted a bibliometric analysis of research published by the World Bank and the Council for British Teachers (CfBT) (Verger, Fontdevila, Rogan & Gurney, n.d.). In mapping development research on education privatization from 1990 to 2014, the authors found that research on education privatization progressively increased throughout the period (Verger, Fontdevila, Rogan, & Gurney, n.d.). The fact that trends we expected to find in our analysis of CER articles were reflected instead in more applied research suggests that literature created and disseminated by this epistemic community is more closely linked to worldwide historical developments in education than research published in CER. Perhaps this is because organizations such as the World Bank have a vested interest in diagnosing educational needs, proposing reforms, and evaluating solutions (Steiner-Khamsi, 2016). Supporting this view, Little argues that educational development literature, such as the early work done on modernization and human capital theories, has primarily served to justify investments made by international banks and organizations (2000,
With this in mind, the apparent detachment of ICE can be a strength. The theoretical side of the field can produce perspectives on development that can only be gained from a historical lens removed from direct involvement. Useful scholarship produced in the ICE field need not be a consideration of the immediate present or the near future. For example, the three articles in our sample that contained the largest number of mentions of the root ‘privat’ are all longitudinal reflections on educational change: a 1965 piece on continuities between the Tokugawa Shogunate of medieval Japan and 19th century Meiji educational reform, a 1975 statistical analysis tracing changes in the decades following World War II in Japan, and a 2012 critical discourse analysis of the impact of the 1990s Education for All movement on Laos and Cambodia (Duke, 1975; Kobayashi, 1965; McCormick, 2012). If scholarship was only produced in the moment, of the moment, our understanding would be short-sighted and incomplete. Open collaboration and dialogue between the theoretical and applied dimensions of the field can build a unified body of knowledge stronger than either dimension could establish alone.

In recent years more bridges have been built between the academy and development organizations, particularly by consultants who traverse the porous divide between the two communities, yet these links can be fragile (Theisen, 1997). The division between practitioners and academics has been a common topic in CER Presidential Addresses over the years (Arnone, 2001; Brembeck, 1975; Masemann, 1990), a concern supported by our findings that the corpus of academic knowledge created in the academy is somewhat detached from trends and debates in the policy and practice field. Future research could compare discourse on public and private education generated within the self-reflecting international
organization circles with that produced by the more theoretical field of ICE, analyzing the
extent to which thematic emphasis transcends the boundaries of each domain.
Appendix 6.0: Figures

Figure 6.1: Breakdown of articles by type of education by decade (% proportion)

Figure 6.2: Changes in mentions of privatization over time
Figure 6.3: Articles with mentions vs. no mentions of privatization by region (total)
Appendix 6.1: Coding Scheme

Type of Education

Questions about both level and type do not apply to this article (e.g. maybe some articles about methods, conceptual pieces)

- Agree (skip to next section)
- Disagree

Is type of education explicitly a focus (i.e. public/private)?

- No
- Yes
  
  If yes, what types are discussed? Select all that apply.
  
  - Not applicable (type of education not explicit focus)
  - Private (for-profit or not-for-profit)
  - Public (government controlled)
  - Other. What type? Describe: ________________

Geographic Focus

Does the study have a geographic focus (include single case studies, comparative studies and studies of geographic regions; select ‘no’ for global research)?

- No
- Yes

If yes, what world region is the study focused on (or what region is the country/are the countries found in, not all countries in a region have to be included)? (Select all that apply). If unsure, please refer to: http://www.uis.unesco.org/DataCentre/Pages/regions.aspx

- Arab States
- Central and Eastern Europe
- Central Asia
- East Asia and the Pacific
- Latin America and the Caribbean
- North America and Western Europe
- South and West Asia
- Sub-Saharan Africa
- Other. Briefly explain: 

Substance: Privatization

Search each term in each document by going to ‘edit’ then ‘advanced find’ and looking at the number of instances that appear. Do not check “whole word” or “case sensitive.” Skim the instances quickly and exclude ones that don’t fit (e.g. polic – we want policy and policies, not police; for minorities, we want historically marginalized groups, not a discussion of amount in some other context).

- Privatization/Private Schools. “privat”
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https://eric.ed.gov/?q=capability+approach+analysis&pr=on&ft=on&id=EJ1020635

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CHAPTER 7

An Analysis of the Comparative Education Review Journal:

Research Methods in ICE

Hyungoo Lee, Danni Mao, Shelby Searles, Yaojia Zheng
Introduction

The field of International Comparative Education (ICE) has undergone substantial progress since its inception, incorporating an increasing number of methodological and theoretical approaches to augment the scope of its research. Although the earliest idea of comparing education systems can be traced back to Rousseau’s “Emile” in the 1770s, the field of ICE as an interdisciplinary field to facilitate value judgement based on comparing educational systems was not founded and consolidated until the 19th century (Brickman, 1960). The discussion over a more “scientific approach” in the 1960s among comparative education specialists has formalized the basics of comparative methodology (Bereday, 1964; Holmes, 1977; Noah & Eckstein, 1969). In the following decades, Rust, Soumaré, Pescador, and Shibuya (1999) found that the research projects that appeared in major journals in comparative education were dominated by qualitative studies, highlighting a striking lack of experimental design between 1985 and 1995. Since then, the field of ICE has integrated a range of interdisciplinary theories and approaches (Crossley, 1999), such as gender theory, modernization theory and anthropological theory, rendering the incorporation of different research methodologies inevitable. However, the literature has been limited in focusing on the current methodological trend in ICE and its progress since the 21st century.

A better understanding on the trend of research methodology is of great importance to the development of comparative education. Increasing clarification in research methodology contributes to the cohesion of the field through “gluing” together the research community (Rust et al., 1999) and educating new-comers for the dominant approaches. The overall research methodological orientation in the ICE community offers an indication of the general direction of the field in choosing competing philosophical assumptions: either the “subjective
and multiple” quantitative approach or the “objective and singular” qualitative approach (Rust, 1999). Such observation would offer important predictions over the future direction of ICE methodological research.

**Research Questions**

Recognizing the importance of assessing the overall changes of research methods within ICE, this paper aims to address a number of inquiries related to the various methodology and data types in the field. The first inquiry pertains to how the composition of methodology and data types in ICE changed over time. Our first hypothesis is that the types of methodology and data used changed in relation to the most prominent theoretical framework at a given time – e.g. the qualitative approach would have increased in usage with the rise of postmodernism and remained popular as long as this framework retained its prominent relevance. As Rust et al. (1999) found ICE to be “methodologically fragmented and pluralistic,” we further hypothesize that there is no dominant methodology – and the complementary data types – that predominantly characterizes research in the field.

A second line of inquiry addresses whether we can identify conspicuous trends of the methodology and data types used over time. Our third overall hypothesis is that the increasingly scientific approach to comparative education over time heightened the use of methodology and data types suited for empirical studies – both qualitative and quantitative. Thus, non-empirical studies, such as theory papers and literature reviews, would have decreased in proportion over time, whereas empirical studies would have increased in proportion over the same time period. Before these questions are addressed with the findings of our study, we explain the data and research methods below.
Data & Methods

This study examines one of the top journals in the field of International Comparative Education: *Comparative Education Review* (CER). As the official publication of the Comparative and International Society, the CER was established in 1957 to study educational phenomena around the world. The flagship scholarly journal regularly publishes research investigating the social, economic, and political forces behind education, which has continuously provided important findings from a comparative and international perspective. Thus, the CER has effectively captured and recorded the development of the field of ICE, which is why we chose this journal to focus our analysis on.

In this study, we analyze a data set comprised of 301 articles published in the CER. Our unit of analysis was an individual journal article, and the major task was to identify the data collection and the data analysis research strategies of each article in the sample. The data were collected by students in the course of Education 202 at Stanford Graduate School of Education, who were instructed to only code the articles published in the first issue of each year from 1957 to 2016 for workload considerations. Students were asked to only code research articles, research notes, and theory building pieces. If the first issue were a special issue that did not contain any relevant articles, the subsequent issue would be coded. For each article piece, students identified the data analysis method (“empirical, qualitative”; “empirical, quantitative (does not use statistical modeling)”; “empirical, quantitative (uses statistical modeling)”; “empirical, mixed methods”; “essay, theory paper, or literature review”; “other”). For each empirical article, the corresponding type of data collection was also coded (“participation/observation”; “interviews”; “surveys/questionnaires”; “content analysis (e.g. of textbooks, journal articles, newspapers, transcripts, speeches, policy documents)”; “secondary
data (e.g. test scores, enrollment rates, or data produced by another source); “historical analysis (e.g. draws on multiple sources and analyzes broad, long term trends); “other”.

We engaged in a longitudinal content analysis of articles appearing in the CER. Because only a small portion of articles were coded, we chose to concentrate our analysis on the percentage points of each method/data type adopted to highlight the relative importance of each in the field. Moreover, we wish to gain the historical insights into the development of research strategies, we examined the time trend to show how the field progressed regarding data collection and analysis.

Findings

As a subset of social science research, we assumed that the research strategies in ICE should echo the conventional strategies in the social sciences. Thus, we began our inquiry by identifying the relative popularity of various data analysis strategies that characterize the social sciences in general. Although some research categories are not strictly mutually exclusive, each category represents unique elements that we chose to treat as separate research strategies. We accumulated all of the strategies noted by the coders, and then calculated the relative percentage of each analysis strategy to delineate a tentative typology of what might be considered the dominant methodology in our field.

The breakdown of data-analysis research strategies is illustrated in Figure 7.1. Out of the total 301 studies for the 1957-2016 period, we found that most studies (34%) in the field of ICE were essays, theory papers, and literature reviews. Since the mainstream analysis research strategy in the social sciences today is empirical, quantitative method with statistical modeling, such finding contradicts our original assumption, suggesting that the typology of studies accumulated from the ICE research context does not necessarily reflect research
practice in the general social sciences. Moreover, we found the smallest percentage (5%) of papers used empirical, mixed methods. This is expected simply due to the sheer difficulty of performing mixed methods.

Figure 7.2 illustrates the three most interesting trends of percentage of methodology type in each decade. Overall, there has been a decline in essay, theory paper or literature review, and an increase in empirical research for both qualitative and quantitative studies with statistical modeling; this indicates that the field has moved from building conceptual framework and fundamental theories, to providing evidence from empirical studies. Before the 1960s, there was a methodological unity among the early comparative education specialists. Theory paper consists of 60% of the entire research body and there was no empirical quantitative research with statistical modeling. Moving to the 1960s, a major debate took place about research methodology in comparative education, in attempt to promote a more “scientific” approach in the field (Rust, 1999). Since then, empirical research, both qualitative and quantitative, has become more common for the field, in compared with the sharp drop in theory papers. In the most recent decades, theory paper has dropped to 16.67%, while empirical quantitative research with statistical modeling has increased to 30.56%. Qualitative research has surged up to 47.22%. The reason of the sharp rise in the qualitative research is due to an increase in case studies and ethnographic/anthropological studies, which is associated with the rise of postmodernism in the recent years.

Figure 7.3 represents the aggregate percentage of data type from the 1950s to 2016. The total percentage of data types amounted to 135 percent due to the fact that several papers used more than one data type. Out of the 301 articles coded, 407 data types were totaled. This means that for certain articles, more than one data-collection strategy was adopted.
Figure 7.3 indicates that the most frequently used data type is secondary data (31.50%). With increasing availability of data collected by international organizations, such as PISA and TIMSS tests, it is not surprising that studies are analyzing secondary data sets. The second most frequently used data type is ‘not empirical papers’ (30.80%) which entails theory papers, literature reviews, and essays. While non-empirical papers appear in this graph to dominate the field, Figure 7.4 illustrates that this data type is highly concentrated in the earliest years of the CER and has slowly declined over time. Historical analysis (17.20 %) is the third most used data type, followed by interviews (14.90%), content analysis (14.90 %), surveys and questionnaires (14.30 %), and participation and observation (8.30 percent). Only 3 percent of papers were coded as ‘other,’ with ‘other’ defined as data types that do not fit in with the types mentioned above. While the most interesting aspect of this graph is the high percentage of non-empirical studies in the CER, Figure 7.4 illustrates a more representative trend of data-types over time, showing the decreasing frequency of non-empirical papers, and the rise of empirical, both qualitative and quantitative, studies.

The most noteworthy\footnote{Dramatic changes in data type usage, as seen in trends over time, were the criterion for selecting the four data types mentioned in this section.} changes in the data types used over time in the CER are illustrated by Figure 7.4. Out of the total 8 data types analyzed in the study, Figure 7.4 shows that the trends of interviews, content analysis, secondary data and non-empirical data most accurately capture the methodological changes that have transpired in the field. As aforementioned, non-empirical data are the most predominant type used in the earliest years, consisting about 65% and 57% of all data types utilized in the 50s and 60s, respectively. This data type, however, has declined precipitously in usage in the following decades and reached its lowest mark of 3.6% in the 2010s. Contrariwise, the data type that has followed a trend
almost antithetical to the one of non-empirical data is secondary data: following its relatively late introduction in the 60s, secondary data are the most predominantly used data type in the 2010s, composing about 31% of all data types. The increasing availability of such data, as addressed above, could explain the prevalence of its usage in the journal’s articles. Interviews and content analysis, on the other hand, have seen generally increasing trends that have similitude, notwithstanding their disparate starting points in the 50s. During the decade of the CER’s inception, content analysis was the second most predominant data type used – accounting for about 18% of the total – followed by interviews, which ranked third at about 6% of the total. Interestingly enough, these two data types have reached their peak in the 2010s, each composing about 22% of the total data types used in this decade. In light of the recent growth of qualitative methodology, the increase in content analyses and interviews prevalently used for this particular research method is not too surprising.

**Limitations**

The limitations of this study are manifold. For one, the publications for 1973 and 1990 were not included in the analysis, thereby rendering the aggregate figures for the methodologies and data types used in the 1970s and 90s potentially unrepresentative of their true values.

Another limitation that could have affected the overall results is the inclusion of data from Issue No. 3 rather than Issue No. 1 for 2006. Considering that the coded issue only has 5 articles, however, the data that were analyzed in this study might not have been too different from what could have been were the correct issue coded. Related is another possible limitation arising from coding only one issue per year; the resultant findings would not be as

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17 Intriguingly, secondary data usage peaked in the 70s when it made up about 36% of the total, but this can be attributed to the relative under-utilization of the data types that pertain to qualitative methodologies.
accurate and their implications not as veritable as when all the published issues were coded. As such, the fluctuations seen in trends in Graphs 2 and 4 may be from measurement error that results when samples are examined than from actual changes in the trends. Another limitation related to coding is the assignment of one coder per issue. Contrary to the method used by Rust et al. (1999), whereby two coders were assigned per article with an extra coder acting as a mediator were conflicting results to arise, this study relied on one coder to accurately evaluate the methodology and data type(s) used. Because a number of articles do not explicitly state the methodology used in the study (Rust et al., 1999), each coder had to make judgments based on their prior knowledge of methodology and data types, thus potentially weakening the reliability of the findings. Despite these limitations, however, the findings from this study are significant as discussed below.

**Discussion & Conclusion**

The purpose of this study is to develop a deeper understanding of the methodologies employed in the field of ICE, and through our analysis we found several interesting trends and changes in methodology over time. First, while in total non-empirical papers are the most frequent in the CER, upon closer inspection, this paper found that the highest concentration of non-empirical papers is in the 1950s and 1960s journals and have since decreased in frequency. Conversely, empirical studies, both qualitative and quantitative, have not only increased but also progressively diversified types of data collection. Over time, there appears to have been an expansion of methodology and data types, shifting away from non-empirical papers in the 1950s and 1960s to an increase in both qualitative and quantitative empirical papers, pointing towards a loss of unity in methodology over time (Rust et al., 1999). The sharp increase of secondary data usage from the 1950s to the 1970s, in particular, is inversely
related to the sharp decrease in theory, essay, and literature review papers, which dropped from approximately 65% to 20% of the total in less than two decades. This increase in the use of secondary data can be seen throughout the social science fields, particularly due to international agencies, such as the UN and World Bank, amassing data sets that are accessible and cost-efficient for researchers to acquire (Atkinson & Brandolini, 2001). Another finding of this study is that papers in the CER have increasingly used multiple types of data. This could be due to the fact that in addition to primary data, studies are also using secondary data from international agencies, as aforementioned. Overall, our findings point to the field of ICE becoming more data-driven, which has allowed for us to assess the implications for the field as well as make predictions for the future of ICE.

Through an understanding of the direction of the field, we can better frame the purposes of ICE. The increase in empirical papers and decrease in non-empirical ones over time addresses a shift from mainly drawing connections for theoretical purposes to using comparative and content analyses, case studies and others that better suit the scientific approach of ICE. While the field initially focused on how particular theories could explain phenomena and trends in international education -- along with overall trends in the 20th century social science progression -- the field of ICE has now become more specialized, which could explain the increasing diversification in data types over time.

With this knowledge of the changes in methodology and data types over time, we can make predictions about the future of ICE. Our findings show that the field of ICE is moving towards more data-driven methodologies. One possible reason for this is that as the field became more established, it progressed towards an application of conceptual frameworks that warranted empirical studies. For example, the rise of postmodernism engendered an increase
in the use of qualitative methods and corresponding data types that better suited pluralism, the
basis of this framework. As the world converges through globalization, the need for empirical
studies for the purpose of policy building will increase. In terms of secondary data and their
continued collection by international agencies, the field will be expected to analyze these data
in order to predict outcomes and goals for future educational policy, both at the national and
international levels.

Another prediction is that while the data, most notably in Figures 7.2 and 7.4,
demonstrate a strong increase in qualitative and quantitative methodologies and data types,
this trend may not stay linear in future decades. The CER is still young, and so is the field of
ICE; and while our study illustrates an increase in empirical papers and decrease in non-
empirical ones that have taken place so far, the field may experience a shift back towards
theoretical papers and literature reviews, in response to rapid changes in the field. In that case,
the field will inevitably need to self-reflect and analyze its dynamic nature over the past
decades, assess the relevance of established theories, adjust conceptual frameworks and
possibly create new theoretical explanations that may further affect the methodologies
employed in ICE.

For future research regarding trends in methodology in ICE, several steps can be taken
to gain an even deeper understanding on this subject. Future research should address this
study’s limitations and resolve the gaps in it through several methods. For instance, this study
concentrated on the CER and only focused on the first issue of each year, with the exception of
a few years for which the first issue did not meet the coding criteria. A future study should
analyze all issues of the CER and see if there is any interesting distribution of methodology
within each year between the issues. Furthermore, a more comprehensive look at all the
comparative education journals would allow for a larger sample of ICE papers and therefore a richer, more representative demonstration of the trends within the ICE field. Additionally, a correlational study between the geographical focus and methodology might further explain where empirical versus non-empirical papers are most frequently used and why. Furthermore, a regional study of where these papers were published and what methodology was employed could explain an academic preference of particular methods that vary from country to country.

Overall, one key takeaway of our findings is that the changes in methodology and types of data over time speak to a larger trend of the field of international comparative education. Studies in ICE are becoming more empirically driven, moving away from theoretical and essay papers, and becoming more pragmatic and scientific in methods. While the highest percentage of methods used in our field remains non-empirical, based on the trends, this percentage will inevitably shrink and the percentage of empirical papers will continue to increase. It will thus be of academic interest to study whether the trend of methodology used in the field conforms to a cyclical pattern, wherein non-empirical and empirical methods alternate to dominate the researchers’ approach.
Appendix 7.0:

Figure 7.1:
Figure 7.2:

Figure 7.3:
Figure 7.4:
References


Appendix A: List of Acronyms

CfBT – The Council for British Teachers
CER – Comparative Education Review
CIES – Comparative and International Education Society
FDI – Foreign Direct Investment
ICE – International Comparative Education
IR – International Relations
PDF – Portable Document Format
STEM – Science Technology Engineering Math
UNESCO – United Nations Educational, Scientific and Cultural Organization
UN – United Nations
USSR – Union of Socialist Soviet Republics
USA – United States of America
US – United States
UK – United Kingdom
Appendix B: Coding Document

CODING PROTOCOL:
THE EVOLUTION OF KNOWLEDGE CREATION IN COMPARATIVE EDUCATION

Developed by EDUC 202: Introduction to International & Comparative Education
Fall 2016

INSTRUCTIONS

Data collection: Download your assigned articles and ‘back matter’ or ‘contributor information’ sections (maybe print out the latter for your two issues). Within an issue only code research articles, research notes, and theory building essays. Do not code introductory statements, presidential letters, editorials, movie or book reviews, and so on. If you are having trouble downloading the sections you need or are uncertain of whether to code a certain article, please ask.

Coding: Start by reviewing the coding scheme, this will make coding faster. We find it works best to skim the entire article, then answer the questions, returning to the article to respond as needed. You can move forwards and backwards through the survey, answers are not final until you hit ‘submit’ at the end. Even after you hit submit, you can contact us if you find you want to change a response. It should take approximately 20-25 minutes to code each article. In two instances you will have to go outside the article for information. 1. “N. citations” is available by entering the title into google scholar, instructions below. 2. The “Author” section information is available in the ‘back matter’ or ‘contributor information’ section of your issue.

Each article has been assigned a unique number, captured by the variable article_id

SECTION 1. GENERAL

(we have anonymized the data) Coder Name (i.e. your name):

year Year
volume Volume
issue Issue
start_page Start page
end_page End page
title Title
**citations** Number of citations (Paste the full title of the article into the following link and enter the number after the “Cited by” term at the bottom of the entry: https://scholar.google.com/. If no entry is found type -99): __________________

**SECTION 2. AUTHORS**

Details about the authors can usually be found in a separate document entitled “Back Matter” or “Contributors.” Please complete for all listed authors in the order they are listed (please let us know if you have an article with more than five authors). For authors with multiple institutional affiliations, please list just the first one mentioned.

**no_authors** Number of authors: ________________

**auth1_gender** Author 1 Gender (based on name and/or pronouns used in description):
- 1 - Male
- 2 - Female
- 3 - Unknown

**auth1_instname_known** Author 1 Institution Name:
- 1 - Institution name known.
- 2 - Institution name unknown

**auth1_instname_text** If known, please enter: __________________

**auth1_instloc_known** Author 1 Institution Location Country:
- 1 - Institution location known.
- 2 - Institution location unknown

**auth1_instloc_text** If known, please enter country: __________________

**auth1_insttype** Author 1 Institution Type
- 1 - University
- 2 - Other
- 3 - Institution type unknown

**auth2_gender** Author 1 Gender (based on name and/or pronouns used in description):
- 1 - Male
- 2 - Female
- 3 - Unknown

**auth2_instname_known** Author 1 Institution Name:
- 1 - Institution name known.
- 2 - Institution name unknown

**auth2_instname_text** If known, please enter: __________________
auth2_instloc_known Author 1 Institution Location Country:
  • 1 - Institution location known.
  • 2 - Institution location unknown

auth2_instloc_text If known, please enter country:__________________

auth2_insttype Author 1 Institution Type
  • 1 - University
  • 2 - Other
  • 3 - Institution type unknown

auth3_gender Author 1 Gender (based on name and/or pronouns used in description):
  • 1 - Male
  • 2 - Female
  • 3 - Unknown

auth3_instname_known Author 1 Institution Name:
  • 1 - Institution name known.
  • 2 - Institution name unknown

auth3_instname_text If known, please enter:__________________

auth3_instloc_known Author 1 Institution Location Country:
  • 1 - Institution location known.
  • 2 - Institution location unknown

auth3_instloc_text If known, please enter country:__________________

auth3_insttype Author 1 Institution Type
  • 1 - University
  • 2 - Other
  • 3 - Institution type unknown

auth4_gender Author 1 Gender (based on name and/or pronouns used in description):
  • 1 - Male
  • 2 - Female
  • 3 - Unknown

auth4_instname_known Author 1 Institution Name:
  • 1 - Institution name known.
  • 2 - Institution name unknown

auth4_instname_text If known, please enter:__________________
**SECTION 3. METHOD & ANALYSES**

**analysis** What **best** describes the analysis method in this article? Pick one.
- 1 - Empirical, qualitative
- 2 - Empirical, quantitative (does not use statistical modeling)
- 3 - Empirical, quantitative (uses statistical modeling)
- 4 - Empirical, mixed methods
- 5 - Essay, theory paper, or literature review
- 6 - Other.

**analysis_other_text** If other, describe: ______________
If the article is an empirical project, what kinds of data/analysis are used? Select all that apply.

- 0 - Not an empirical article
- 1 - Participation/observation
- 2 - Interviews
- 3 - Surveys/questionnaires
- 4 - Content analysis (e.g. of textbooks, journal articles, newspapers, transcripts, speeches, policy documents)
- 5 - Secondary data (e.g. test scores, enrollment rates, or data produced by another source)
- 6 - Historical analysis (e.g. draws on multiple sources and analyzes broad, long term trends)
- 7 - Other.

If other, describe: ______________________________________

SECTION 4. GEOGRAPHY

Questions about geography do not apply to this article (e.g. maybe some articles about methods, conceptual pieces)

- 1 - Agree (skip to next section)
- 2 - Disagree

Is the study at global or cross-national level (i.e. in theory all countries could be included even if some don’t make it into the dataset, or the study is at a global level unrelated to location)?

- 0 - No
- 1 - Yes

If no, does the study focus on a single country?

- 0 - Not applicable (study is at global or cross-national level)
- 1 - No
- 2 - Yes.

If yes, please list: ____________________

Does the study have a geographic focus (include single case studies, comparative studies and studies of geographic regions; select ‘no’ for global research)?

- 0 - No
- 1 - Yes

If yes, what world region is the study focused on (or what region is the country/are the countries found in, not all countries in a region have to be included)? (Select all that apply)

If unsure, please refer to: http://www.uis.unesco.org/DataCentre/Pages/regions.aspx

- 0 - Not applicable (study does not have geographic focus)
- 1 - Arab States
• 2 - Central and Eastern Europe
• 3 - Central Asia
• 4 - East Asia and the Pacific
• 5 - Latin America and the Caribbean
• 6 - North America and Western Europe
• 7 - South and West Asia
• 8 - Sub-Saharan Africa
• 9 - Other.

region_other_text If other, briefly explain:______________

country_group Is the study explicitly focused on a group of countries not captured in ideas of geographic region or global level (e.g. OECD, “Third World”)?
• 0 - No
• 1 - Yes.

country_group_text If yes, describe: _______________________________

SECTION 5. LEVEL & TYPE OF EDUCATION

leveltype_applicable Questions about both level and type do not apply to this article (e.g. maybe some articles about methods, conceptual pieces)
• 1 - Agree (skip to next section)
• 2 - Disagree

level_focus Is level of education explicitly a focus (i.e. Early childhood/Primary/Secondary/Higher or Tertiary/Other)?
• 0 - No
• 1 - Yes.

level If yes, what levels are discussed (select all that apply)?
• 0 - Not applicable (level of education is not explicit focus)
• 1 - Early childhood (before primary school)
• 2 - Primary
• 3 - Secondary
• 4 - Higher/Tertiary
• 5 - Other.

level_other_text If other, what level? Describe: _________________

type_focus Is type of education explicitly a focus (i.e. public/private)?
• 0 - No
• 1 - Yes

type If yes, what types are discussed? Select all that apply.
• 0 - Not applicable (type of education not explicit focus)
• 1 - Private (for-profit or not-for-profit)
• 2 - Public (government controlled)
• 3 - Other.

type_other_text If other, what type? Describe: __________________

SECTION 6. SUBSTANCE

Search each term in each document by going to ‘edit’ then ‘advanced find’ and looking at the number of instances that appear. Do not check “whole word” or “case sensitive.” Skim the instances quickly and exclude ones that don’t fit (e.g. polic – we want policy and policies, not police; for minorities, we want historically marginalized groups, not a discussion of amount in some other context).

Politics
Politics. “politic” policit_mentions

Economy
Economy. “econom” econom_mentions

Society
Gender. “gender” gender_mentions
Minority. “minorit” minorit_mentions
Inequality/equality. “equalit” – equalit_mentions
Globalization. “global” global_mentions

Education
Science. “science” science_mentions
Achievement. “achievement” – achievement_mentions
Finance. “finance” – finance_mentions
Policy. “polic” – polic_mentions
Privatization/Private Schools. “privat” privat_mentions

SECTION 7. FINAL THOUGHTS

final_thoughts

Notes (anything interesting, odd or confusing about the article you want to mention): __________________