Corporate Social Responsibility and Profitability Research in the 2000s: A Bibliometric Analysis

Ibrahim Alnohud\textsuperscript{a*}, Maisarah Saat\textsuperscript{b}, Suresh Ramakrishnan\textsuperscript{c}, Abdallah Al Hanande\textsuperscript{d}, Department of Accounting and Finance, Azman Hashim International Business School, Universiti Teknologi Malaysia, Johor Bahru, Malaysia, Email: \textsuperscript{a} akibrahim@graduate.utm.my

The purpose of this paper is to study the bibliometric analysis of corporate social responsibility and profitability from the year 2000 to 2019. The Scopes database was used, and the search was restricted through the use of key words, namely corporate social responsibility and profitability. The analysis was done according to the year of publication, source of publication, writer, nation, affiliation, and the keywords analysis. The results showed that the two most important publishing journals in corporate social responsibility and profitability are the Business Ethics Journal and the Social Responsibility Journal. The United States and the United Kingdom are the two main countries controlling the output of publications. Most of the publications are in the administration science and accounting sectors. Regarding corporate social responsibility, investigation and results are partial to individual data collected from a database such as Scopus from 2000 to 2019. This paper's results provide researchers with insights into the growth of Corporate social responsibility research, which has grown to include internal stakeholders. It also benefits the detection of Corporate social responsibility sources and profitability. The results provide a detailed image of organisational behaviour with regard to the domino effects of CSR programs. It also strengthens internal CSR understanding as another significant CSR viewpoint. The novelty of this paper comes from the use of abibliometric approach to corporate social responsibility and Scopus database profitability. The researcher also recommends conducting further studies in the future. By using another database, for example, there may be a difference in the results. In addition, another level of company achievement can be used in addition to profitability. The role of social responsibility can be used to achieve competitive advantage.

\textbf{Key words:} CSR; Bibliometric analysis and profitability
1. Introduction

Corporate social responsibility (CSR) is widely used in research business. CSR has become a major priority in numerous organisations' strategic portfolio and has gained considerable attention as a research subject (Aguinis & Glavas, 2019). CSR is a partnership between companies, the environment, and society.

CSR encompasses a broad variety of topics, including employment, social justice, human rights, corruption and community partnerships (Gürlek & Tuna, 2019). CSR includes the topics of employment, growth rate, and even gross domestic product (GDP), in economic aspects.

Following the evolution of CSRD research in social and environment, this study has used bibliometric approach as the main tool to discover the dissemination of such research among the publications in the Scopus database. The results of this study may help our understanding of the importance of CSR and the importance of social and environmental issues. The publishing patterns examined herein can also be useful in recommending and predicting potential research focuses.

This study will use the descriptive approach as it will provide a detailed overview of the disclosure for social and environmental issues, knowledge and research. The results of this paper match the present CSR literature on improving corporate social responsibility disclosure. At present, there is a dearth of existing research on social and environmental issues. As such, this study will contribute to the understanding and definition of social and environmental patterns and innovations.

This study contains five main components: the introduction of this study, the development of social and environmental issues, the techniques used such as bibliometric analysis, the results and discussion, as well as the implications of this study and its limitations. Elements of research and discussion are supported by a detailed descriptive analysis that depends on which year it was published, the source of the publication, the country in which it was published, the educational institution, and the field of study.

The keywords were analysed by definition and were found in titles and the summaries of published social and environmental issues.

2. Development of social and environmental issues corporate social responsibility

Several previous studies described CSRD as the activities that were transmitted to stakeholders through the annual reports of a business (Garcia-Castro & Aguilera, 2014; Ghazali, 2007; Muhammad Jamil, Alwi, & Mohamed, 2003). CSRD is considered to reflect all CSR activities documented by companies in their annual reports. The concept of CSR coverage was
first used by large corporations (Kolk, 2008). At the beginning of the cycle, companies started creating special social studies, which were published largely by companies from Western Europe (Fifka, 2013). During the period 1990-2000, the emphasis changed from "social reporting" to "environment reporting." This was due to the importance of the environmental dimensions of production and the growth of the sustainable development principles (Azzone & Bertelè, 1994; Werhane & Freeman, 1999). After 2000, all "social and economic" elements were incorporated into the concept of non-financial reporting. Such research activities were of a broader nature and included economic issues (Lipungu, 2014; Rikhardsson, Andersen, & Bang, 2002).

2.1. Environmental issues of corporate social responsibility

Environmental safety authorisations manage limited natural resources and the production of natural capital in a way that would sustain the environment in the long term (Belu, Misztal, Butlewski, & Rachieru, 2014). It makes environmental conservation one of the main supporters of corporate social responsibility.

Furthermore, activities linked to corporate energy consumption, lower waste disposal costs and reduced water consumption are behaviours that reduce their harmful environmental influence due to socially responsible practices (Bello, Yusuf, Isichei, & Abubakar, 2019). There is also feedback from socially conscious organisations and the stakeholders. In both organisations, environmental issues have become the main problem and the general public acknowledges the environmental harm that has been done in the past (Vaaland, Heide, & Grønhaug, 2008).

Consequently, it is the environmental aspect of corporate social responsibility that tends to conceal the environmental effect of a particular organisation's mission, products, and services. Making good use of energy savings and sustainability could impact the usage of natural resources (Sharmin, Zafar, Akram, Alam, & Ahmad, 2015). One of the issues concerning CSR is environmental preservation. Therefore, the purpose of this part is linked to the way the environment is equalised and the sustainability of fundamental socio-economic benefit-producing processes.

CSR encourages an idea of corporate openness to various interested groups apart from the stakeholders. The well-being of workers, the population and public society, current and future are of great concern for environmental security. Thus, long-term environmental conservation guarantees access to scarce natural resources and the use of natural capital in a way that will support the ecosystem. It presents the opportunity to address the core social requirements of the present and future. Over the years, corporations have altered the tactics organisations have used to protect natural resources from harmful environmental consequences. The planet has undergone many forms of devastation, which continues to require businesses to take
Corporate environmental responsibility is clarified as the company's duty to protect its processes, products and facilities from environmental effects; to minimise waste and emissions; to improve resource production and productivity, and to eliminate events that could be damaging to future generations.

2.2. Social issues of corporate social responsibility

The relationship between social issues and CSR is a modern idea (Forester, 2009). Forester noted that after it was established, Porter and Kramer emphasised the social influence of CSR. It has no generally accepted definition as a new concept and has therefore been quite challenging to relate it to CSR. It is expected that the company will be responsible for people's social well-being, whether they are workers, consumers or not. The key point to understand social issues is that the company must try to integrate the social issues of the greater community into its activities and in a way that directly or indirectly impacts them (Arsić, Stojanović, & Mihajlović, 2017). Therefore, the expectations and needs of society and their demands for improved social well-being should be recognised and handled accordingly (Sharma et al., 2016). It is important for organisations to recognise the social issues that need to be addressed. They divide the social issues by order of importance to business and society: (1) general issues (2) social influences on the value chain, and (3) competitive social sizes (Forester, 2009). Enterprises should be run in such a way as to recognise and protect society's interest in improving their health and well-being, regardless of whether they are company staff, partners or customers (Jonsson, Gluch, Stiller, & Femenías, 2017). The result is a healthier working and corporate atmosphere within and outside an organisation and its good citizenship in society. We also note that from the applied point of view that social issues encompass how the day-to-day social life of the society is influenced by the business processes.

Nasrullah and Rahim (2014) further argued that the social content of the corporate social responsibility program of an organisation covers a variety of topics that can be classified into three groups: (1) labor rights and practices; (2) human rights; and (3) other social issues. Ultimately, corporate social investment and community-based philanthropic operation is an additional aspect of CSR's social element. This consists of many programs such as poverty alleviation, education and awareness, capability development and capacity building, organising athletic activity, constructing and renovating schools, delivering and enhancing public health services, offering recreational facilities, etc.

3. The relationship between corporate social responsibility and profitability

The theory of shareholders was extended by Friedman who pointed out that corporations behave in their business endeavours according to the requirements of their shareholders. Business directors have an ethical responsibility here to grow shareholder capital. The theory of stakeholders (Freeman, 2004) shows that the company has a duty to act in the interests of the
stakeholders. However, Freeman and Dmytriiev (2017) claimed the businesses must remain mission-driven and this aim lies inside a moral realm. Businesses that create value by conducting CSR activities do not create problems for other stakeholders. In fact, stakeholder theory says all of the stakeholders are interdependent. According to Carroll (1991), businesses should participate in CSR procedures within the authorised framework and moral principles in order to develop good corporate citizens. The discussion indicates that profits must be allocated to all the company's owners, whether they are the primary shareholders or part of the community. Nevertheless, the discussion about CSR has attracted attention in recent years due to its relation to profitability. For a half-century, the relationship between profitability and CSR was a subject of hot debate among researchers. In attempting to establish a relationship between profitability and CSR activities, numerous studies claimed mixed results (Griffin & Mahon, 1997; Orlitzky & Benjamin, 2001). Heinz (1976) reported an important relationship between CSR, profitability ROA and ROE. Graafland and Van de Ven (2006) also reported the relationship among CSR activities and profitability, and their study found that CSR and profitability have a positive relationship. The results support preceding research. In comparison, Siregar and Bachtiar (2010) point out that the relationship between CSR and profitability is not important. Mirfazli (2008) also reached a similar conclusion in their analysis of the connection between profitability and CSR activities.

A literary review of previous studies makes clear that there is a gap regarding the relationship between the social responsibility of companies and profitability. These mixed results show that some of them prove the relationship while others do not support the relationship between the variables. For this reason, the analysis has taken on the role of clarifying the future directions of social responsibility and increasing interest as expressed through increasing publications on this topic.

4. Date and method

The study has used the data from Scopus database. As theoretical research has become more complex, Elsevier developed Scopus with the intention of providing a detailed summary of the academic results from different research fields. Journals covered by the Scopus database are released and studied annually for their extremely high values. The collection encompasses the major abstract and citation of peer-reviewed literature that spans an inclusive variety of scientific articles, books, and conference proceedings. As such, a sample of scholarly publications has been chosen as the search engine in the recent report. This study used keywords such as corporate social responsibility and profitability used in research from 2000 to 2019. Figure (1) demonstrates the search method for these articles:
Research for this study focused on abstract, newspaper source, topics, and references. A total of 281 data sets have been transferred to Microsoft Excel based on publication year, publishing source, country and region, authorship, association, and field of study. The use of bibliometrics is based on the very formal nature and requirements of scientific literature. Hence bibliometric analysis is essential for this purpose to quantitatively evaluate the type of these studies. For this purpose, descriptive statistical approaches like cluster numbers, amount of activities, combination of publications, overall intensity linking, and quotation levels are used. The rationale for using bibliometric analysis stems from recent changes that are essential for an objective evaluation of published work. The quality of the scholarly publication is generally measured by bibliometric studies. Bibliometric analysis is particularly useful in calculating the occurrence of such actions as a quantitative method in abstract literature, as opposed to analysing then understanding the content of the literature. Consequently, bibliometric analysis has been used to study the essence of knowledge and non-financial reporting data.

To this end, VOS viewer (www.vosviewer.com), the free software application has been used to examine and visualise the associations between authors, countries, co-citations, and words. The mapping method VOS (visualisation of similarities) was used to measure and locate each subject in a two-dimensional map using the distance between two objects; and represents as accurately as possible the similarity or relatedness of the items, identifying each cluster with an unlike colour (Van Eck & Waltman, 2010).

The meaning of the visualisations is clarified in depth in the results segment. In general, the meanings are grounded on the size of the circle, the mark font representing the number of occurrences, the colours of the cluster and the distance between two circles / nodes on behalf of their similarity. The horizontal and vertical axis are meaningless (Khalil & Crawford, 2015).
5. Finding and discussion

5.1. Publication finding and trend

Further publications will be expected in the next two years, with 2017 being a remarkable year with about 25 papers. Declines were observed between 2015 and 2016 (a decrease of 0.15%) and 2011 to 2012 (a decrease of 0.14%).

The development of any research area, according Price (1976), consists of four phases:
1. Forerunner
2. Adequate growth exponentially
3. Consolidation of the knowledge base
4. Reduction the amount of items.

Dabi et al. (2016) clarified that the forerunner step is where a small group of scientists begin publication in a novel field when, in the proper exponential growth cycle, a growing number of scientists draw on the numerous dimensions of the topic which are yet to be discovered. The third phase occurs as the information body is collected, and the work volume declines in the fourth phase.
5.2. Source of publication

The sum of published work also indicates the pattern of output of any academic study. In this background, Figure 2 found that the amount of CSR and non-financial reporting publications has increased since 2000. The authors hypothesise and expect that the number of articles could increase in the coming years, following an upward trend for CSR and non-financial reporting observed annually. Prior to 2011, the number of articles released was less than 10. For total goods over 281 the number continues to grow after 2011.

Figure 3: Documents per year by source.

The high number of publications usually means a varied range of study topics and the multi-disciplinary nature of CSR and non-financial science. 281 papers listed in this analysis have been published in various newspapers. Figure 4 demonstrates the top five non-financial CSR and sources in these 19 years. It was detected that the Journal of Social Responsibility had published the most papers since 2012, followed by Sustainability Switzerland, a management and governance journal.

As the research field of the Journal of Social Responsibility focuses on social labour, organisational behaviour which aims to improve human conditions and welfare through community opportunities involves discussions around ethical issues connected toward the business.

When determining the replicability of results and improving existing information, the diffusion of knowledge is important. Scholars use resources like Influence Factor and Citation to
track and analyse academic journals. Cite Score, SJR and SNIP information have been extracted for the purpose of this paper to additionally classify the publishing basis for CSR and non-financial articles. Three such performance indicators of the article are briefly explained in the following sections.

Elsevier built a Cite Score citation influence metric to test many scholarly publications. Cite Score makes available a set of simple, reproducible journal metrics covering all of the Scopus database journals. This analyses the middling quotes obtained per article published in the title. Cite Score values are created for articles published in three earlier calendar years according to citation counts in a specified year, divided by the number of papers in the Scopus database in those three previous years. The values give a good indicator of these articles results.

Another important predictor of journal publication is Impact Factor (IF). IF is designed annually by the Institute for Scientific Information (ISI) and the proportion of the number of articles cited in all papers available in the IF is calculated in any given year, which is then compared to the total number of citable papers published in the same area in the preceding two years. IF was heavily criticised due to factors such as the lack of quality assurance of citations, the prevalence of self-citation and the bias in English(Ramin & Shirazi, 2012). The indicator used to calculate the academic impact of academic journals is the SCImago Journal Rank Indicator (SJR). SJR accounts for both the number of quotes a newspaper provides and the significance or popularity of the newspapers where such quotations occur. Falagas, Kouranos, Arencibia-Jorge, and Karageorgopulos (2008) noted that this index is based on the database Scopus, which has more indexed journals than ISI. As a result, the SJR index is derived from scholarly journals to examine the empirical impact of employee-centred studies.

A group of scholars Goodman, Kuninavsky, and Moed (2012) created an enhanced citation method to measure journal papers in response to IF's weakness. Source Normalised Impact per Paper (SNIP) was a result of this group's citation-according metrics. This tests the effect of contextual citations by using Scopus data to calculate citations according to the total number of citations in a subject area, which arises from the quotation count of a journal per paper divided by the capacity for quotation in the topic area. SNIP corrects variations in citations observed across academic fields, enabling more reliable cross-field comparisons of citation effects. In a subject area where attribution is less possible and vice versa, the effect of a single quote will assume greater. The score's reliability is demonstrated by stability intervals. Smaller newspapers tend to be more stable than larger newspapers.
### Table 1: Top ten most active journals publishing CSR and profitability.

<table>
<thead>
<tr>
<th>no</th>
<th>Journal title</th>
<th>No of publishing</th>
<th>Cite score</th>
<th>SNIP</th>
<th>SJR</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Journal of Business Ethics</td>
<td>25</td>
<td>4.46</td>
<td>2.006</td>
<td>1.860</td>
</tr>
<tr>
<td>2</td>
<td>Social responsibility journal</td>
<td>20</td>
<td>1.93</td>
<td>0.763</td>
<td>0.432</td>
</tr>
<tr>
<td>3</td>
<td>Journal of Cleaner Production</td>
<td>10</td>
<td>7.32</td>
<td>2.308</td>
<td>1.620</td>
</tr>
<tr>
<td>5</td>
<td>Corporate Social Responsibility and Environmental Management</td>
<td>7</td>
<td>7.18</td>
<td>2.372</td>
<td>1.670</td>
</tr>
<tr>
<td>6</td>
<td>Corporate Ownership and Control</td>
<td>6</td>
<td>0.11</td>
<td>0.307</td>
<td>0.155</td>
</tr>
<tr>
<td>7</td>
<td>Strategic Management Journal</td>
<td>6</td>
<td>7.91</td>
<td>3.263</td>
<td>8.835</td>
</tr>
<tr>
<td>8</td>
<td>Management Decision</td>
<td>5</td>
<td>2.74</td>
<td>1.058</td>
<td>0.731</td>
</tr>
<tr>
<td>9</td>
<td>International Journal of Applied Business and Economic Research</td>
<td>4</td>
<td>0.07</td>
<td>0.459</td>
<td>0.114</td>
</tr>
<tr>
<td>10</td>
<td>Sustainability Accounting Management and Policy Journal</td>
<td>4</td>
<td>2.89</td>
<td>0.946</td>
<td>0.778</td>
</tr>
</tbody>
</table>

All publications were allocated to a nation or country, and to an agency to additionally investigate their distribution. The results demonstrate that 281 journals with an unnamed country or territory may be assigned to a country or territory, which represents 95.8 per cent of the journals. The journals created from countries the top three countries that control publication. The United States contributed 70 publications, 24.9%, followed by the United Kingdom with 27 publications (9.60%) and Australia with 26 publications (9.25%).
Figure 4: Document by author

5.3. Publications according to the institution
Figure 6: Documents by affiliation.

Important papers mentioned in Scopus cited CSR. While most of the papers were contributed to by Modak, Panda, and Buccella, they were not created to be the maximum cited contributors, which came from the three most cited publications. This indicates that there is no association between the number of journals and the number of citations. It is a fact that older journals are often more likely than newer publications to have already been referenced. This could be one of the reasons why the most influential writers are not the most cited authors in this 19-year survey. Smith (2007) pointed out that the overall understanding is that the number of quotes represents the impact and popularity of an article as well as its content. Franklin, Parmentier-Batteur, Walter, Greenberg, and Stella (2003) claimed, however, that the number of articles quoted does not reproduce their content, but rather their popularity. More open-access publications are being increasingly cited with their increasing recognition (Stauffer et al., 2013).

To continue to grow, collaboration is often promoted in order to further increase existing knowledge. More beneficial research results could be fostered by partnerships among academics with mutual interest in a specific research field. Studied in Table II is the total connection intensity indicating collaboration among researchers in this vein. The highest three total connection strengths were registered by the three major contributors – Andriukaitiene, Swaen, and Vveinhardt. This indicates the possible connections between the number of journals and the number of co-authors. Scholars in similar fields will usually lean towards co-authoring their publishing quantity with other scholars to increase their shared knowledge.

Table 2: Authors, total articles, citation, and total link strength.

<table>
<thead>
<tr>
<th>Author</th>
<th>Document</th>
<th>Citation</th>
<th>Total link strength</th>
</tr>
</thead>
<tbody>
<tr>
<td>Buccellad</td>
<td>3</td>
<td>18</td>
<td>3</td>
</tr>
<tr>
<td>Fantail</td>
<td>3</td>
<td>18</td>
<td>3</td>
</tr>
<tr>
<td>Modak</td>
<td>4</td>
<td>145</td>
<td>3</td>
</tr>
<tr>
<td>Pandas</td>
<td>4</td>
<td>223</td>
<td>3</td>
</tr>
<tr>
<td>less</td>
<td>3</td>
<td>42</td>
<td>0</td>
</tr>
</tbody>
</table>
The word "social responsibility" has been reported to be most closely related to all groups. This is detected by the centrality of the largest node of its analysis. The robust correlation of "responsibility" originated in "corporate governance," "company performance," "continuous research."

Table 3: Cluster and number of items identified

<table>
<thead>
<tr>
<th>Cluster</th>
<th>No. of items</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cluster1</td>
<td>8</td>
<td>Corporate governance, corporate social responsibility, disclosure, sustainability development, social responsibility, CSR and corporate philanthropy.</td>
</tr>
<tr>
<td>Cluster2</td>
<td>8</td>
<td>Financial performance, firm performance, firm value, corporate social performance, performance, profitability, and environment performance</td>
</tr>
<tr>
<td>Cluster3</td>
<td>4</td>
<td>Content analysis, stakeholder theory, game theory, and supply chain.</td>
</tr>
<tr>
<td>Cluster4</td>
<td>2</td>
<td>India and China</td>
</tr>
</tbody>
</table>
6. Conclusion

This study makes available an evaluation of journals on CSR and profitability from 2000 to 2019. The topic of CSR and profitability is gaining attention as a result of the analysis.

Figure 8: Analysis based on time

NOTE:
Increased organisational uncertainty and community pressure on Corporate social responsibility programs Nascimento and Pólvora (2016) clarify how sustainability issues are growing, and are in need of transdisciplinary expertise and practice methods. Therefore, the environmental, economic, social and cultural aspects need to be discussed at the same time. At this juncture, papers with a focus on ethics and social responsibility as their core themes are the main sources of CSR and productivity publications. The explanation for this finding is that business ethics and corporate social responsibility are the core focus of CSR and profitability. Therefore, most articles can be found in the Business Ethics Journal. The USA and UK are the most important countries on the subject for the past 20 years. The leading organisations for publication are Deakin University and the University of Wollongong. Modak and Pandas are the most productive authors. Therefore, there is no correlation between the number of articles and the number of citations in CSR and profitability. To sum up, the understandings derived from this bibliometric analysis are that publications on CSR and profitability are growing, ethics and social responsibility journals are publishing on the topic have spread geographically and little cooperative research is created. Among others, a few main topics related to CSR and profitability, as well as more defined topics are emerging in journals.

7 Limitation

This paper suffers from limitations just like every other study paper. The limits of this study and bibliometric work are that the results are limited to the Scopus database accessed on
December 31, 2019 only. While Scopus is among the largest repositories for science publishing, it does not contain all CSR and profitability publications. Many online databases, such as the Internet of Sciences, Google Scholar, PubMed, and RIS, may have been investigated. Quantitative methods are also used in bibliometric analysis, so that the precision of the publications cannot be measured. Therefore, it might be possible that some of the papers included in the analysis would only address a subject other than CSR, and profitability. Further content review is suggested, and future research should be conducted in view of these limitations.
References


Pancreas, 42(3), 461-466.
