Discussion on Covid-19 and International Relations: VOSviewer Bibliometric Analysis of Articles by US and Chinese Authors

Yeyen Subandii\textsuperscript{1*}, Ariel Nethan\textsuperscript{2}, Maria Veri Diana Baun Yuel\textsuperscript{3}
International Relations, Universitas Respati Yogyakarta

\textbf{Corresponding Author:} Yeyen Subandi \textsuperscript{1} yeyensubandi@respati.ac.id

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\textbf{ABSTRACT}

The initial emergence of the coronavirus which made the Covid-19 Pandemic in Wuhan, China, made the international world of countries coordinate and cooperate with each other to deal with the pandemic. The Chinese government is accelerating in fighting the pandemic by providing medical assistance, cooperating with other countries, and actively promoting community-building with a shared future for humanity and the process of globalization. Different state policies in handling it make researchers determined to carry out research whose articles have been published by Scopus to become material for study and policy. This study aims to explain writing trends and characteristics of International Relations and Covid-19 conducted by authors from the United States and China. In this study using the VOSviewer bibliometric analysis method, a study conducted by researchers found that the trend of Scopus-indexed journal articles from authors in the United States and China had grown quite significantly until 2022.

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INTRODUCTION

In the world of International Relations, the relationship between the United States and China is an important bilateral relationship in the world. The relationship between the United States and China is not the same as the relationship between the United States and the Soviet Union at that time, or as it was before. After the emergence of the Covid-19 Pandemic, relations between the United States and China showed great differences in terms of public opinion, economic and trade relations, and strategic trust. It is very important to stay aware of the relationship between the United States and China after the emergence of the Covid-19 Pandemic to uphold Deng Xiaoping's guiding principle of "hiding strength and biding time while trying to achieve something", that is, it is very important for China to face the tough challenges in the world, under the new situation and to safeguard China's security and development environment (Yuan, 2010).

The coronavirus that caused the Covid-19 Pandemic from the end of 2019 to 2022 has become a common issue internationally, including writers or researchers from the United States and China as well as researchers and academics from Indonesia (Airlangga and Akrim 2020; Syamsurrijal et al. 2021). For Indonesian writers, in addressing the Covid-19 Pandemic, one can see four impacts: First, the Covid-19 Pandemic has had an impact on psychological trauma, health problems, and medical problems, and resulted in death (Abdullah, 2020; Ing et al., 2020; Yuliana, 2020); (Aldila et al., 2020; Angeline, Safitri, and Lutfia 2020; Ansori et al., 2020). Second, the Covid-19 pandemic has had an impact on the decline and weakening of the global economy (Azikin, Karno, and Fitriani, 2020); (Susilawati, Falefi, and Purwoko 2020); (Caraka et al., 2020). Third: The Covid-19 pandemic has had an impact on changes in communication patterns in the government system and education system through very limited teaching and learning activities (Machmud et al., 2021).

China is a key player, not just an actor, in the global search for health security. Reiteration of this point is useful for International Relations studies, which often portray China as a factor to contend with, especially given the background of the country as the first to report the outbreak of the Covid-19 pandemic. This paper adopts an analytical framework developed through a summary of routines in Chinese engagement in global health from a practitioner's perspective: aid, interdependence, governance, and knowledge. These are the core elements in a country's pursuit of engagement with the rest of the world. After the introduction, the second section of the paper reviews contributions from China in the history of global plague control over the past century. The third section discusses structural issues affecting access to vaccines, which are essential for bringing Covid-19 under effective control. The fourth section identifies some challenges China is facing in global health governance. The final section offers a few concluding thoughts, reiterating the nature of interdependence in the global search for enhancement of health security (Zha, 2021).
From a review of previous literature studies, from several authors in reputable journals, there has been no research looking at International Relations and the Covid-19 Pandemic in terms of narrative issues built through research topics in Scopus-indexed articles by authors from the United States and China. This research indirectly complements the shortcomings of previous studies, although it has similarities in the use of VOSviewer bibliometric analysis, but has issues and actors from different countries.

THEORETICAL REVIEW

The bibliometric examination has likewise been utilized in different exploration fields like examination on development (Biemans, Griffin, and Moenaert, 2007), research on administration (Zupic and Čater, 2014), research on the travel industry (Merigó et al., 2019; Mulet-Forteza et al., 2018; Vishwakarma and Mukherjee, 2019), business research (Valenzuela-Fernandez et al., 2019) and research in geophysics (Mulet-Forteza et al., 2020). While research on human security in the field of ecological security on environmental change influences from carbon use (An, Yao, and Shen, 2022), other than that exploration of human security in the field of food security has been done by (Bellia, Bacarella, and Ingrassia 2022) about collaborations between road food and sanitation points in the logical writing a bibliometric examination with science planning and looks at the impact of the Covid-19 Pandemic in terms of narrative issues built through research topics in Scopus indexed articles by Indonesian authors using VOSviewer bibliometric analysis (Syamsurrijal et al., 2021)

METHODOLOGY

This study uses a bibliometric review analysis based on Scopus-indexed journal articles by authors or researchers from the United States and China. Data collection based on the keywords "International Relations and Covid-19" found 738 journal article documents. Furthermore, the writer or researcher narrowed down the words "International Relations and Covid-19" which found 33 journals and conference proceedings that were eligible after going through a selection of publication years starting in 2019, 2020, 2021, and 2022, with choices in English. Articles selected from the Scopus database are stored in the form of a CSV file. Then analyzed using two forms of analysis: First, analysis of search results on the Scopus menu, and second analysis using VOSviewer software. To provide a clear picture of the steps taken in the research can be seen in Figure 1:
RESULTS AND DISCUSSION

Trends in Publication of Articles on International Relations and Covid-19 by Authors from the United States and China

Based on data obtained from the Scopus database, using analysis of search results, it was found that the trend in the number of journal articles written by authors from the United States and China from 2019 to 2022 on topics related to International Relations and Covid-19 greatly increased. From the Scopus database, there are 128 authors. Below is a picture of the names of authors from the United States and China which are widely cited based on VOSviewer analysis:

Figure 2. Co-authorship – analyzing the author
From the picture above the names of the authors from China Cao z, Chen j, Du y, Hu y, and Jiang L only have one article document, but the five authors get 231 citations. After the co-authorship analysis - analyzing the author, the writer or researcher will look at and analyze the co-authorship - analyze the country. The visualization results of VOS viewer's bibliometric analysis found 30 countries that wrote about International Relations and Covid-19, but the current research will focus on the United States and China, these two countries have the most documents and number of citations during the period 2019 to 2022, regarding these can be seen in the table below:

<table>
<thead>
<tr>
<th>Country</th>
<th>Documents</th>
<th>Citations</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>21</td>
<td>262</td>
</tr>
<tr>
<td>China</td>
<td>13</td>
<td>291</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>5</td>
<td>95</td>
</tr>
<tr>
<td>Italy</td>
<td>5</td>
<td>105</td>
</tr>
</tbody>
</table>

Source: Scopus Databases

From the results of the bibliometric analysis of the VOSviewer table above, it can also be seen in the image below:

![Figure 3. Co-authorship – analyzing a country](image)

The picture above shows the co-authoring of an article on International Relations and Covid-19. In figure 3 the big nodes show significant countries, namely the United States and China with 21 and 13 document articles. Furthermore, VOSviewer's bibliometric analysis will analyze keywords from US and Chinese authors in International Relations and Covid-19. From the results of keyword analysis, there are 152 similar keywords in the search, the results can be seen in the table below:

<table>
<thead>
<tr>
<th>Keywords</th>
<th>Occurrences</th>
</tr>
</thead>
<tbody>
<tr>
<td>Covid-19</td>
<td>25</td>
</tr>
<tr>
<td>International Relations</td>
<td>5</td>
</tr>
<tr>
<td>Pandemic</td>
<td>6</td>
</tr>
</tbody>
</table>
From the results of the bibliometric analysis of the VOSviewer table above, it can be seen in the image below:

Figure 4. Co-occurrence – analyzing author keywords

Figure 4 above, shows that the Covid-19 keyword node is large, indicating a significant keyword. Furthermore, VOSviewer's bibliometric analysis will analyze countries citing authors from the United States and China in International Relations and Covid-19. There are 30 countries citing authors from the United States and China, this can be seen from the results of the VOSviewer bibliometric analysis table below:

Table 3. Analyzing citations – countries

<table>
<thead>
<tr>
<th>Country</th>
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</tr>
</thead>
<tbody>
<tr>
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</tr>
<tr>
<td>Italy</td>
<td>5</td>
<td>105</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>5</td>
<td>95</td>
</tr>
</tbody>
</table>

From the results of the bibliometric analysis of the VOSviewer table above, it can also be seen in the image:
Figure 5. Citation – countries

Figure 5 above shows that the United States and China citations have large nodes, indicating significant documents and citations. Furthermore, VOSviewer's bibliometric analysis will analyze countries citing authors from the United States and China in International Relations and Covid-19. The results of VOSviewer's bibliometric analysis for bibliography-country aggregation found the following results:

Table 4. Analyzing bibliographic coupling – countries

<table>
<thead>
<tr>
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<th>Citations</th>
</tr>
</thead>
<tbody>
<tr>
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<tr>
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<td>105</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>5</td>
<td>95</td>
</tr>
</tbody>
</table>

Source: Scopus Databases

From the results of the bibliometric analysis of the VOSviewer table above, it can also be seen in the image below:

Figure 6. Bibliographic coupling – countries
From Figure 6 above, bibliographic coupling – countries show that the United States and China have large nodes, from this it shows that they have significant bibliographic coupling – countries. The results of the VOSviewer bibliometric analysis for bibliographic coupling – countries in the results table are similar to the results of citation – country analysis. Furthermore, the bibliometric analysis from VOSviewer will analyze the co-citation – the authors cited. There are 3257 authors citing articles from US and Chinese authors. This can be seen from the results of the VOSviewer bibliometric analysis table below:

<table>
<thead>
<tr>
<th>Author</th>
<th>Citations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sheller, M</td>
<td>12</td>
</tr>
<tr>
<td>Shkoler, O</td>
<td>10</td>
</tr>
<tr>
<td>Wade, S. L</td>
<td>20</td>
</tr>
</tbody>
</table>

Source: Scopus Databases

Figure 7 above shows the Co-citation – cited author, writer, or researcher Wade, S. L, Sheller, M, and Shkoler, O has large nodes, this shows that it has a significant number of citations. From the VOSviewer analysis that has been carried out regarding International Relations and Covid-19 written by writers or researchers from the United States and China, it has increased very significantly until 2022.

CONCLUSIONS AND RECOMMENDATIONS

Research on International Relations and Covid-19 articles indexed by Scopus there are only 738 journal article documents. Furthermore, the authors found 33 journals and conference proceedings that were eligible after going through publication year selection starting in 2019, 2020, 2021, and 2022.
Authors from the United States and China are authors who have received many citations from other authors outside of these two countries. Recommendations for further research on International Relations and Covid-19 can still be made for further research because there are still few documents until 2022, or for further research to look at the aftermath of the Covid-19 Pandemic.

**FURTHER STUDY**

For further writing or research, apart from using the VOSviewer analysis tool, you can use a mixed method, one of which is by using a social analysis network to look at International Relations and Covid-19 from US and Chinese authors.

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REFERENCES


