# Halal Tourism Research Bibliometric Analysis in Scopus, ProQuest and Ebscohost

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**Abstract**: With the emerging and increasing interest toward halal product and services, a variety of halal based research can be found in online databases. Halal tourism in research is a quite recent topics in journal articles. Halal tourism subtopics has evolved into many subtopics such as halal culinary, halal destination, halal friendly hotel, halal lodging and halal tourism supply chain. With the use of bibliometric analysis and using Scopus analyzer and VOSviewer, this paper attempts to analyse and visualize research output made in the topic of halal tourism. Data are citations from Scopus, ProQuest and Ebscohost databases using 'halal tourism' as keyword. The data corpus are set for research articles in English and the date range set for 1987 to 2019. Total data collection is 383 citations. This paper aims to discover the subject relation of halal tourism research topics in Scopus, ProQuest and Ebscohost. From this research, related topics of halal tourism can be identified and analysed. Authors and journals of halal tourism would also be analysed.

**Keywords**: Halal tourism, bibliometric, subject relation, VOSviewer

## 1.      Introduction

Halal industry has been growing steadily in recent decade and halal research has branched into many respective subtopics such as halal cosmetics, halal certification, halal slaughter and others. Quite recently, halal tourism topic in research has been emerging steadily. This research is a bibliometric analysis of research been done on halal tourism topic from Scopus, ProQuest and Ebscohost. The objective of this paper is to extract halal tourism concept and citation datasets from research literatures. Islamic knowledge concept is essential complex and requires semantic orientation of English equivalence due to Arabic language. This paper reviews halal contextual subject relation in a state-of-the-art review to understand the concept of halal in Islamic knowledge. Halal tourism concept is also reviewed from past literatures.

The object of the two reviews is to identify and define the concept of halal and halal tourism respectively. In indexing processing and equally in information retrieval, identifiying key term or index term are essential step which will define the outcome of data analysis in the end. Lancaster (2003) who is among the fundamental philosopher in information retrieval advocated analysis of concept at the beginning of an indexing procedure. Principally, conceptual analysis is process which topic or subject is qualititatively examined and the end an operational definition can be produced. From the operational definition, possible index term of key word term can be deduced and used in the next step, which is in citation data retrieval process.

## 2.    Methodology

This research used a mixed of qualititative and quantitative method in which bibliometric study is used. The research is an exploratory sequential model in which qualititative data precedes quantitative data, (Creswell, 2014). Datasets are citations from Scopus, ProQuest and Ebscohost in the form of journal articles in English language. The time range differs due to availability in respective databases. Time range in Scopus is 22 years (1997-2019), ProQuest data time range is 31 years (1987-2018) and Ebscohost data time range is 6 years (2012-2018). Total datasets of citation is 383. The research begins with concept operational definition and with triple element systematic mapping review of the concept of halal in Islam. From the definition and reviews, established index term can be used in information retrieval process. The following set up was used in Scopus :

TITLE-ABS-KEY ( halal  AND tourism )  AND  ( LIMIT-TO ( LANGUAGE ,  "English" ) )

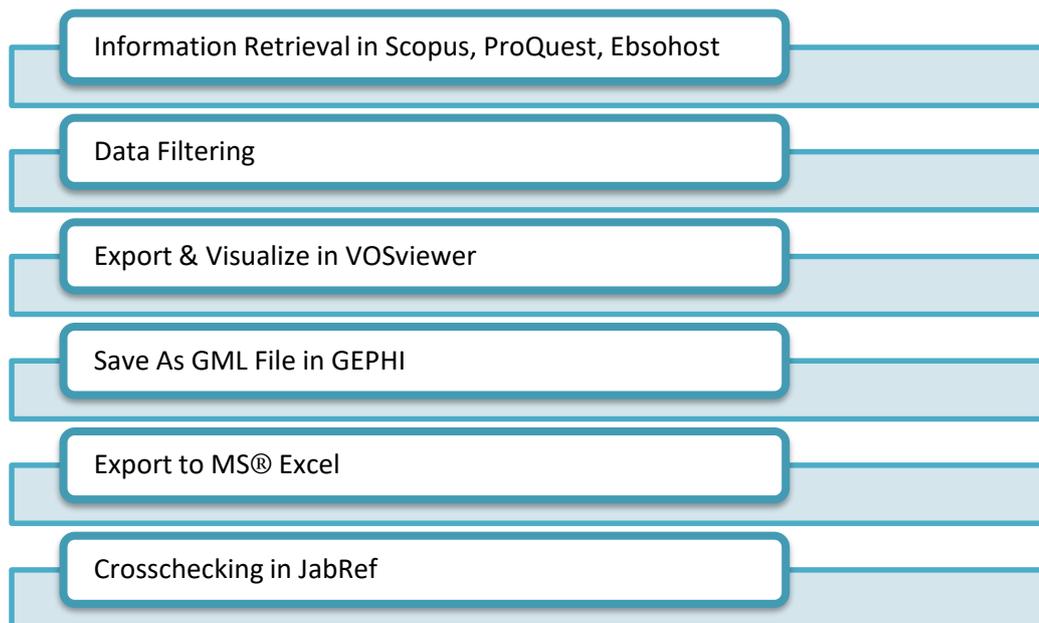For ProQuest, the following search strategy was used,

KEYWORD(halal    tourism),    SOURCE    TYPE(scholarly    journal),    PUBLICATION DATE(1987-2018), LANGUAGE(English)

In Ebsohost, the search strategy was the following,

KEYWORD(halal    tourism),    SOURCE    TYPE(academic    journal),    PUBLICATION DATE(2012-2018), LANGUAGE(English)

The research utilizes rigorous and repeated process of checking and crosschecking data and statistic. The goal is to identify index term connection and subject relation in clusters. The bibliometric used here is co-occurrence of words or terms from data corpus, specifically from titles and abstract. Analysis of citation data is done using VOSviewer and for data crosschecking purposes GEPHI, JabRef and Microsoft® Excel is also used. The research flowchart are as follows:

**Figure 1:** Research Flowchart



- Information Retrieval in Scopus, ProQuest, Ebsohost
- Data Filtering
- Export & Visualize in VOSviewer
- Save As GML File in GEPHI
- Export to MS® Excel
- Crosschecking in JabRef

**3.      Halal Conceptual Analysis and Ontology Review**

In relation to halal, several authors had attempted to mapped its subject relation particularly in its ontological form. Ontology is an explicit set of specification of concepts that describe its relation in a domain, (Gruber, 1995). A number of researches has been done to map out halal subject relation in ontology. The following papers are list of article journal and conference papers specifically mentioning halal and its entities.

**Table 1:** Halal Subject Relation in Ontology

| No. | Authors | Subject Covered | Source | Language |
|---|---|---|---|---|
| 1. | (Kasim, Omar, Fudzee, Ramli, Salamat & Mahdin, 2017) | Halal food industry, E number ontology | IOP Conference Series: Materials Science and Engineering | English |
| 2. | (Farooqui & Noordin, 2015) | Literature review on Quran ontology | Journal of Theoretical and Applied Information Technology | English |
| 3. | (Hanum, Bakar, Rahman, Rosli, & Musa, 2014) | Topic analysis using latent semantic technique | Procedia - Social and Behavioral Sciences | English, Malay |
| 4. | (Abdullah, 2014) | Knowledge sharing process among the halal communities of practice (CoP) | 2nd International Conference on Emerging Trends in Engineering and Technology (ICETET'2014) | English |
| 5. | (Yauri, Kadir, Azman, & Murad, 2013) | Semantic search system for Quranic knowledge using ontology assertion capability | Research Journal of Applied Sciences, Engineering and Technology | English |
| 6. | (Iqbal, Mustapha, & Yusoff, 2013) | Quran ontology supports contextual information | Multicultural Education and Technology Journal | English |
| 7. | (Omar, Kasim, & Hashim, 2013) | E numbers chemical ontology in food additives | Journal of Industrial and Intelligent Information | English |

Kasim et al.(2017) and Omar et al.(2013) proposed ontologies on E chemical entities, which is chemical subtances used in additives in food processing. The E chemical entities is mostly made from doubtful or haram substances. Farooqi and Noordin (2015) reviewed researches on Quran ontology and mentioned a few papers with halal terms in it. Hanum et al. (2014) explored and developed a prototype for topic query in Malay documents from translated Al-Quran collection, translated hadiths collection and web pages. Abdullah (2014) suggested a halal knowledge management that can benefit the communities of practice in halal industry. Yauri et al. (2013) presented a semantic search system that can retrieve verses in relation to their queries relating to the Holy Quran. Omar et al.(2013) developed Quran ontology that supports contextual information that is flexible and extendable for future Quran related semantic application.


**5.      Halal Tourism Definition**

Halal tourism and Islamic tourism is two concepts debated in literatures as to what really is the subject is about. Some authors consider both are the same and others refers to it as separate concepts altogether. The following table list differing opinion of authors about the actual definition of halal tourism.

**Table 2:** Halal Tourism and Islamic Tourism Concept Review

| No. | Authors | Definition | Highlights |
|---|---|---|---|
| 1. | (Jafari & Scott, 2014) | Islamic tourism: "The encouragement of tourists likely to meet the requirements of Sharia law". | Focuses on Islamic law and its requirements to meet the tourist needs but ignored the religion of tourists. |
| 2. | (Carboni, Perelli, & Sistu, 2014) | Islamic tourism: "tourism in accordance with Islam, involving people of the Muslim faith who are interested in keeping with their personal religious habits whilst travelling". | Considers the Islamic law, the target customers (Muslim), and the location of activity, but the product and service offered (i.e. food, facilities) is ignored |
| 3. | (Zamani-Farahani & Henderson, 2010) | Halal/Islamic tourism: "tourism mainly by Muslims who prefer to stay within their culture" | For Muslims and the location of the activities is in Muslim country |
| 4. | (Battour & Ismail, 2016) | Halal tourism: "any tourism object or action which is permissible according to Islamic teachings to use or engage byMuslims in tourism industry" | Consider the Islamic law as the basis to deliver tourism products and service to the target customers who are Muslims, such as halal hotels, halal resorts, halal restaurants, and others halal. Claims that location of activity is not limited to the Muslim world. |

The different opinion of what is halal tourism centers around target customers and the country involved as shown in the review table above. Definitely from the concept review, there are two school of thoughts involving what is considered as halal or Islamic tourism. First, is the believe that the desired tourism is for Muslim travellers traveling in a Muslim country, (Zamani-Farahani & Henderson, 2010) or a halal friendly country, (Battour & Ismail, 2016; Carboni et al., 2014) which more suitable to say that the concept fit the description of an Islamic tourism. The other school of thoughts, ignores the religion of the tourist (Muslim or non-Muslim) and focuses more on the Islamic law and the halal products and services regardless of the country (Muslim or otherwise), (Jafari & Scott, 2014). In the context of this research, decision must be made to choose between the terms or a combination of them in the retrieval process. As this research is a exploratory design, halal tourism is chosen as the key word in the retrieval stage.

## 6.     Findings

In Scopus, 80 research papers were retrieved and in VOSviewer we can see the co-occurrence of term used in the data corpus. Halal tourism appeared more than any other terms in the dataset of 80 research papers. Islamic tourism is the second most used term in the Scopus dataset. The term 'halal tourism' carries 20 occurrence weight from 80 research titles and abstracts. The related term being used are medical tourism, Islamic tourism, heritage tourism and halal hospitality. VOSviewer also divides the results into four numeriocal clusters. The clusters are mainly about research contexts, halal tourism concepts, halal industry and religious research

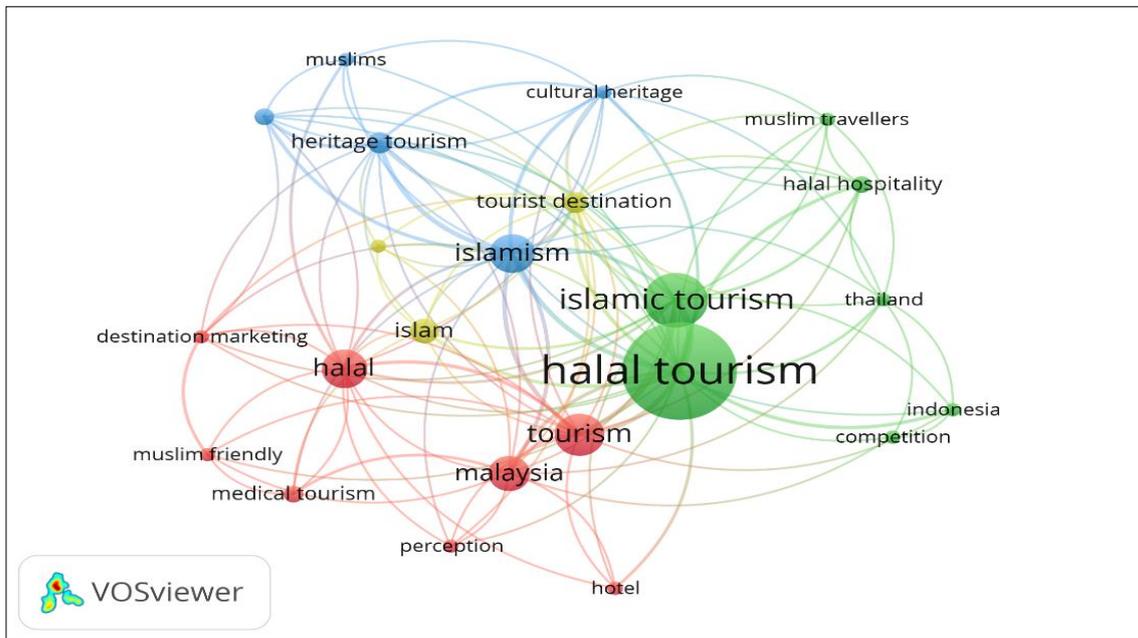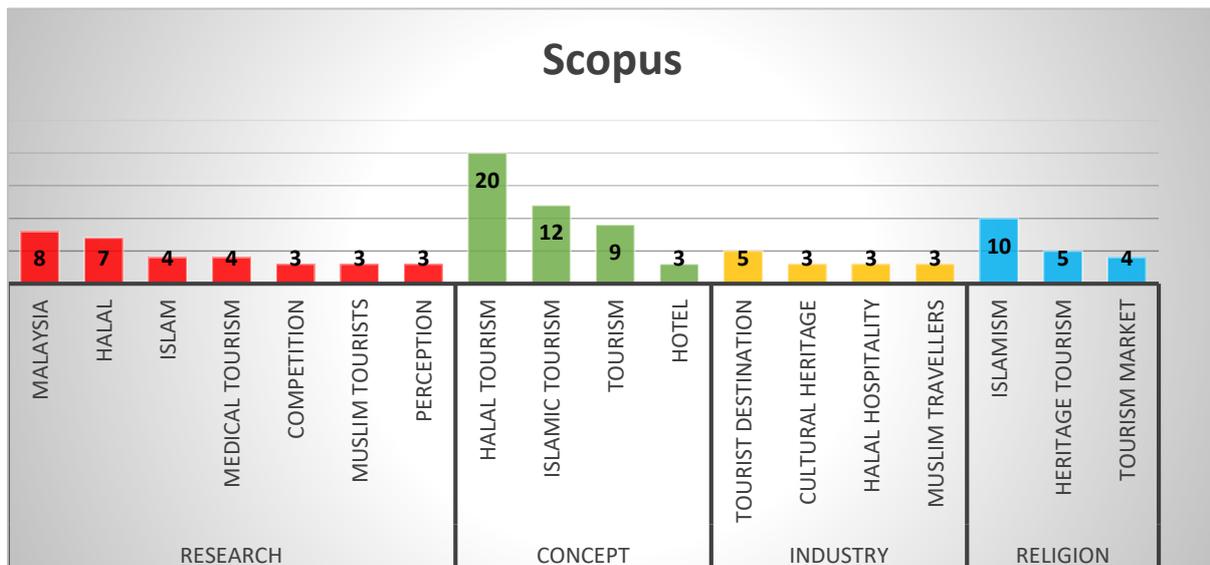**Figure 2:** Scopus Co-word Occurrence Visualization



**Table 3:** Scopus Co-word Occurrence Data Statistics



ProQuest result differs significantly from Scopus, halal tourism term is not the highest score keyword in the result findings which is an oddity considering the keyword used in halal tourism. The highest term found in ProQuest is business research related topics, while halal tourism term amounting just 8 occurrences in the dataset. Islamic tourism does not appear in the ProQuest result unlike in the Scopus. The result which were data analysed from titles and abstract in RIS format file seemed to capture a set of structured terms which routinely and formally used in abstract writing such as relationship, effect, influence and sample. The contrasting result is believed mainly because of Scopus quality characteristics. Scopus is an indexing database in which stringent procedure of peer reviewed process applied to all journal in its database. Scopus database ranks its journals, articles and authors according to numerous research metric. The ranking are basically depending on citation frequency and journal ranking in SCImago Journal & Country Rank. As result, Scopus papers and retrieval is better in term of quality and more representative of the current research direction.

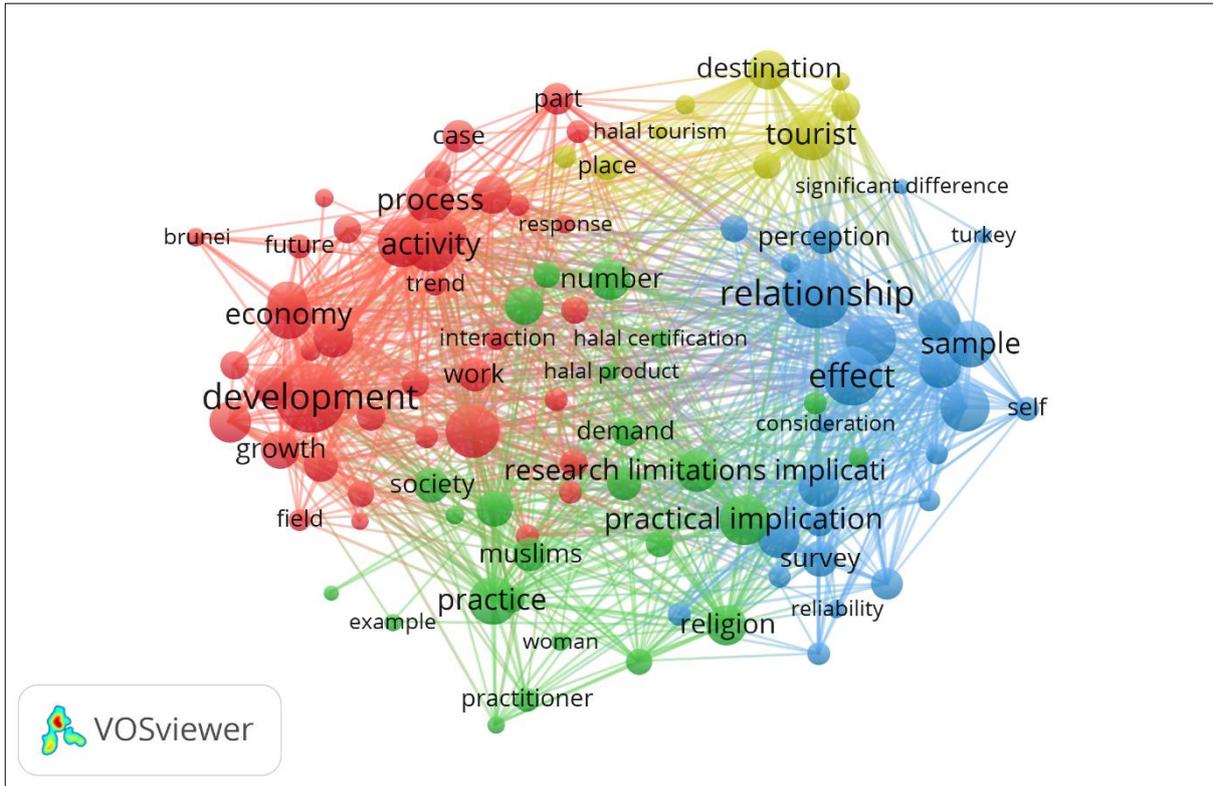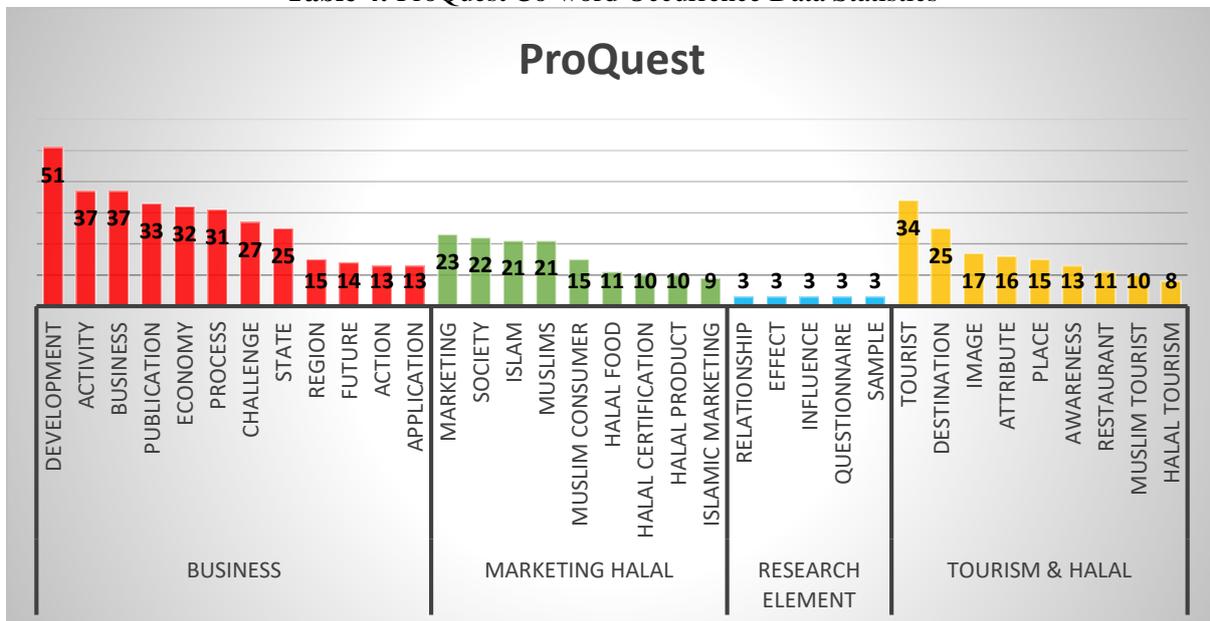**Figure 3:** ProQuest Co-word Occurrence Visualization



**Table 4:** ProQuest Co-word Occurrence Data Statistics



Ebscohost retrieval returns 19 relevant document from 280 citations queried in the database. The result was filtered for English language and article journals. The central index term from Ebscohost data is 'halal food industry' and halal tourism related terms is religious and Islamic tourism. Though the retrieval result returns is very low in comparison to total retrieval, Ebscohost result captured papers discussing halal tourism, Islamic tourism and religious tourism.
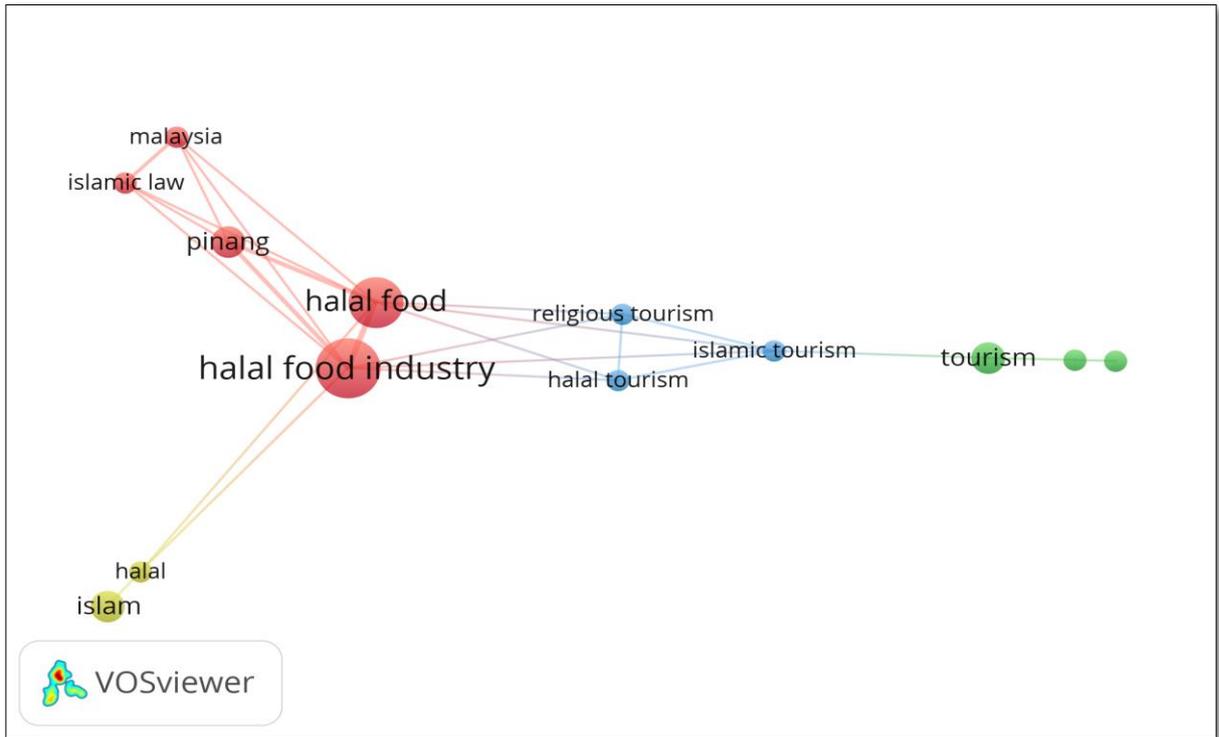
**Figure 4:** Ebscohost Co-word Occurrence Visualization



**Table 4:** Ebscohost Co-word Occurrence Data Statistics



## 6.     Conclusions

Halal tourism concept first appeared in 1997 research written by Mohsin and Ryan. The concept of Muslim friendly tourist attraction visiting Australia from Malaysia and Indonesia was studied in Mohsin and Ryan (1997). The paper was a pilot study in identifying the attitudes of Malaysian and Indonesian governments representative and senior business executives to Australia as a

potential holiday destination. The papers were then consistenly produced until the late 2000s, which saw an upward trends in the research of halal tourism. From this research, it was found that Scopus as the indexing agent of research papers is truly serving as the knowledge repository from subject experts and specialist. Scopus search engine also provides reliable and credible result as shown in the findings. Future research should measure the retrieval, precision and recall to verify findings in this research.

**Figure 5:** Halal Tourism Paper Production 1997 to 2018
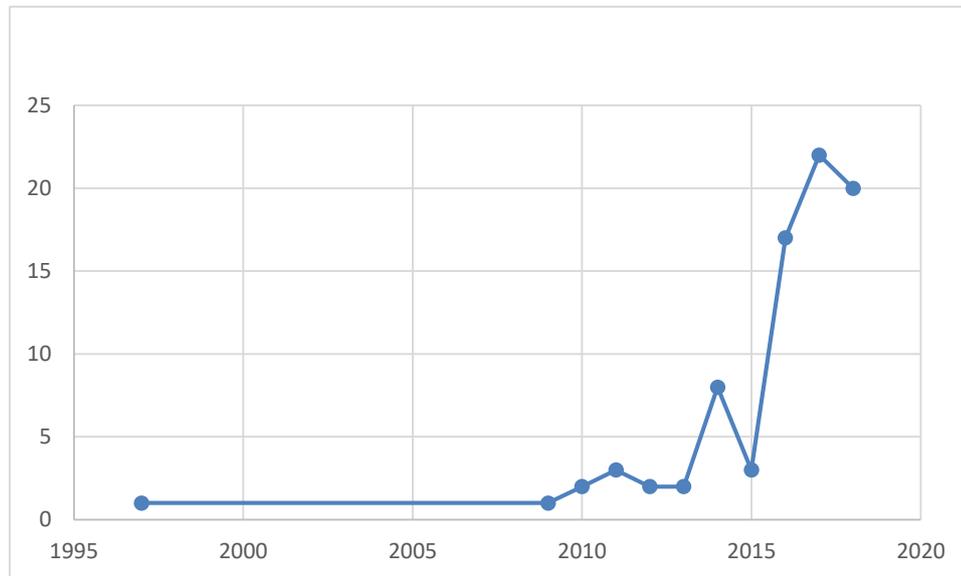


## 7. Acknowledgement

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