

Article

Journal Ranking based on Publication Difficulty Factors (JR_pDF): A Proposed Mathematical Algorithm

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Abstract: Academic publishing appears to be the most important key of the academic functions (academic research, excellence in teaching and learning and community services). Selecting the right journal to publish research results is a challenge to academics. Yet, there is inadequate knowledge about a model specifically directed at the topic of the journal selection process with a mathematical certainty. The objectives of this research are: to identify the main factors that an author or researchers consider when selecting an academic journal for submitting a manuscript, and, to develop a mathematical algorithm of journal selection that provide the best journal choice with a mathematical certainty based on difficulty of each factor. Quantitative research through questionnaires has been applied as an appropriate instrument base to address the researcher's identification of the factors that should be considered when selecting a journal. Questionnaire developed and emailed to academics in 31 public and private universities in the developing countries. Academics reported that the most important publication difficulty factors were publishing in reputable journals, and publishing in a journal that has an impact factor. However, the most least publication difficulty factors were found to be: number of issues per year and if the journal is an open access. The proposed mathematical algorithm of journal's publication difficulty factors was developed and tested.

Keywords: Journal ranking; Publication; Mathematical Algorithm; Academic Research; Promotion; Quantitative; Developing Countries.

1. Introduction

Academic sector in developed and developing world is relatively large, and very competitive due to the growth of academic education institutes (public and private) and due to the expansion of scholars, there are 550 universities in Middle East and more than 320000 academics [1, 17]. The main functions of an academics in higher education institutes are: academic research, teaching and learning, and community engagement and services [10, 7, 12]. Academic research appears to be a key of the three academic functions. A very competitive academic environment will motivate and create high pressure on scholars to produce academic research. Scholars publish their results in a range of forms, such as: book reviews, conference proceedings, books, reviews, preprints, working papers, invited chapters, dictionaries and encyclopedias, scholarly journals.

Academic promotion is one of the most important challenge to academics and based on a range of criteria, such as: excellence in teaching and learning; reputable publications; research grants and innovation; postgraduate supervision; recognition and leadership; social and community services;

consultancy to the government and industries; and administrative roles in the university [17]. Academic publications are measured based on the quantity and quality of publications (how prestigious the journals academics were published in), reputable peer-reviewed journals are those that are indexed and abstracted in well-known databases, such as: Arts & Humanities Citation Index (Web of Science); Science Citation Index Expanded (Web of Science); Social Science Citation Index (Web of Science); Excellence in Research for Australia (ERA); Association of Business Schools (ABS); SCOPUS, to mention but a few, or if the journal has a high Impact Factor (IF).

The process of selecting an appropriate journal is a challenging process to authors and can easily take months, the proper selection of an academic journal is critical to publishing success. Yet, one research paper has been found specifically directed at the topic of developing a model or framework of the journal selection process [15]. Knight and Steinbach, built their model on prior research from different disciplines, their results found about that there are five categories represent the major considerations an author should deliberate when selecting a journal for publication, these are: likelihood of acceptance, credibility and prestige of the journal, potential impact of the manuscript (visibility), timeline from submission to publication, and philosophical and ethical issues. Then, the five categories combined into a graphical model of the journal selection process. Researchers can get benefit from the model, the graphical model provides new researchers with understanding into how journal selection decision balance three categories (likelihood of timely acceptance, potential article impact, and philosophical and ethical considerations). Though, the model has limitations, researchers lack the knowledge required to precisely answer each question proposed by the model, furthermore, the model does not provide the best journal choice with a mathematical certainty. This shapes a motivation for researchers to develop a model that can provide the best selection of a journal with high level of certainty to help authors in the selection process.

2. Promotion and Publications

This section provides a background of academic promotion criteria in developing countries, further it describes publishing process and its main stages.

2.1 Academic promotion criteria

The main criteria for academic promotion are: teaching and learning; postgraduate supervision; administrative roles; academic recognition and leadership; consultancy; community services; research and grants; and publications.

- Criterion 1: teaching and learning: Teaching and learning criterion can be evaluated based on (role as academic advisory, number of credits for the courses, the number of courses taught, number of students per course, involvement in undergraduate student supervisory duties and curricula, the evaluation of teaching quality and performance by students is also considered, and other academic workloads).
- Criterion 2: postgraduate supervision: Postgraduate supervision criterion can be evaluated based on (the involvement in the Master and PhD programmes, number of students under supervision, number of graduated students on time, and the supervisory role (e.g. if supervisor, co-supervisor or a member in a supervisory panel)).
- Criterion 3: administrative roles: Administrative roles criterion can be evaluated based on the contribution to the university and it refers to the involvement, participation and responsibilities in the university. The contribution is measured based on the roles held at the level of university management and leadership, such as: (vice chancellor, deputy vice chancellor, faculty dean, director, head of department, head of programme).
- Criterion 4: academic recognition and leadership: Academic recognition criterion can be evaluated based on the level of respect received by an academic from academic community national or international, such as: (reviewer of manuscripts, journal articles and papers; appointments as examiners of theses; evaluator in a promotion

processes, external examiner; invited as a keynote speaker at conferences; receiving awards (teaching and research awards, or other awards for academic and research excellence); visiting professor; editing academic journals or books).

- Criterion 5: consultancy: Consultancy criterion can be evaluated based on the consultancy provided to agencies (governmental or non-governmental), or industries, research collaborations, contract services, industrial links and joint projects.
- Criterion 6: community services: Community services criterion can be evaluated based on the involvement and participation in providing services to the community, such as: serving as a member of committees (nationally or internationally), voluntary services, participating in community development programmes.
- Criterion 7: research and grants: Research and grants criterion can be evaluated based on number and amount of research grants, sources of research grants, research projects, research projects role (main researcher, co-researcher), research projects impact.
- Criterion 8: publication: The Ministry of Higher Education (MoHE) in developing countries is responsible for setting a regulations and guidelines for the promotion process in the public and private universities, however, each university has the right to determine the quantity and quality of publication for each academic rank. Publication criterion can be evaluated based on quality and quantity of academic publications. Quality of publication includes papers in reputable journals, chapters in books, published books and proceedings. Reputable journals refer to those journals that are indexed and abstracted in well-known databases, such as (Thomson Reuters (ISI), SCOPUS, Association of Business Schools (ABS), Elsevier, Excellence in Research for Australia (ERA)... etc.). Further, the journals have an impact factor (IF). It is acknowledged that publications in reputable journals are the most important forms of academic promotion that receive the most notice from promotion committees.

2.2 Publishing process

The process of academic publishing is divided into three distinct phases: 1) finding an appropriate journal, 2) submit a manuscript to a publisher, and 3) peer-review process. After having a complete manuscript written, the author starts the process of finding the appropriate journal. Journal selection decision is the most challenging decision as the accurate selection is very critical to publishing success process. There are different possibilities in how authors select academic journal for their publication, most of the literature suggest similar ideas about selecting academic journal for publication, such as: "ask your colleagues" or "consult a librarian", while, other authors try to search the Internet to select from a possible journal lists (e.g.: Google; Ulrich's Periodicals Directory; Directory of Open Access Journals; Clarivate Analytics (Thomson Reuters (ISI)); Excellence in Research for Australia (ERA); SCOPUS... etc.). Most of the databases offer a basic data about the journal that are included in their journal lists, such as: P-ISSN; E-ISSN; journal title; research area/field; journal's aims/scope; editor and editorial board; owner/publisher; impact factor, while other databases (e.g. Lamp's journal ranking site; AISNet site; Informing Science Institute) provide more information about the journals, such as: indexing/abstracting; acceptance rate, however, a few databases (e.g. Cabell's online directory) explains each journal's guidelines and the review process, Cabell's directory provide three categories of Difficulty Acceptance (Rigorous, Significantly Difficult, and Difficult) (<https://www.cabells.com>).

Most of the literature, such as: [4, 20, 8, 25, 22, 16] attempt to provide guidance or questions that the authors need to ask when selecting a journal, such as: Is this journal peer-reviewed? Who is this journal's audience? Is this a prestigious journal? How long will it take to see your article in print? however, other researchers provide issues to be considered when selecting a journal, such as:

audience; journal type; basic journal information; the impact, ranking and indexing status by citation databases; review process; article processing charge/fees.

The main problem is that there is inadequate knowledge about a model specifically directed at the topic of the journal selection process with a mathematical certainty. Therefore, the objectives of this research are threefold: firstly, to identify the main factors that an author or researchers consider when selecting an academic journal for submitting his/her manuscript. Secondly, to develop a mathematical algorithm of journal selection that provide the best journal choice with a mathematical certainty based on difficulty of each factor. Thirdly, test of the mathematical algorithm on a real data on a sample disciplines for applicability and reliability purposes for further amendments and improvements. To achieve the research objectives, the following research questions need to be answered by researchers, scholars, and librarians who are most involved with the process of selecting an appropriate journal for publications.

- What are the most important factors that researchers consider when selecting an academic journal when submitting a manuscript?
- What is the weight of each factor compared to other factors?

The remainder of the research is structured as follows: section 3 identifies the research methodology and approach; section 4 presents the results and discussion and testing the mathematical algorithm; section 5 the conclusions, limitations and future work.

3. Research methodology and approach

To achieve the objectives of this research, which needed a high rate of respondents to enhance the validity and reliability in order to generalize the findings of this research, as suggested by the argument of [23, 24, 6, 18], we opted for quantitative research through questionnaires as an appropriate instrument [2, 13, 3] base to address the researcher's identification of the factors that should be considered when selecting a journal for submission a manuscript [19, 21, 11, 14, 5, 9]. The following section describes the process of questionnaire design, deployment, and analysis used. Figure 1 represents the sequential structure of the research phases.

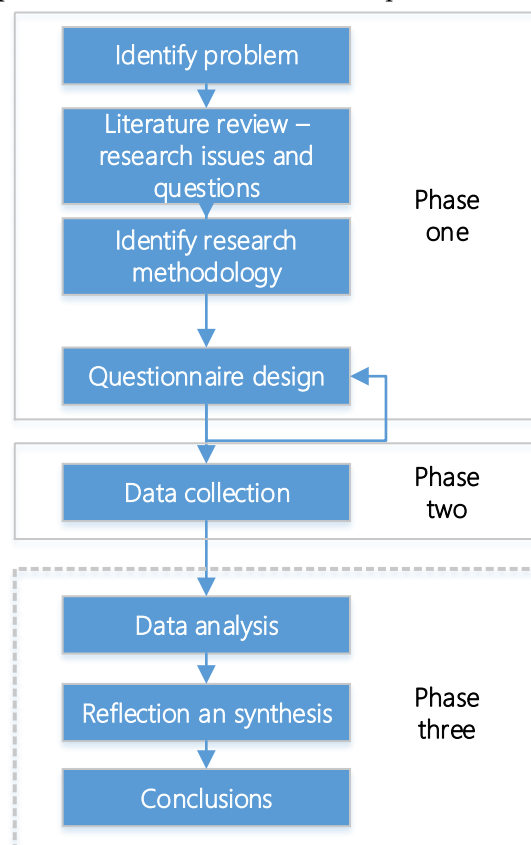


Figure 1. Research phases

3.1 Research phases

- Phase one reviews and document current literature of the main publication difficulty factors related to the selection of an academic journal. The main difficulty factors identified in the literature were then used to develop a questionnaire that aims to gather information about: Abstracting/ Indexing, Impact Factor, Acceptance rate / rejection rate, Number of issues per year, Lag time to publication, Open access / subscription, Article Processing Charge (APC), and Other factors. The questionnaire is centered on gathering information on: the importance of publication difficulty factors, weighting each factor, sorting these factors so the mathematical algorithm can be developed, as well as, other information related to publication difficulty factors.
- Before the formal questionnaire was sent to the academics, two pilot iterations were conducted. The first iteration involved sixteen academics from eight disciplines, these are: information technology, Business, nursing, pharmacy, engineering, architecture, literature, and social sciences. Based on their feedback, certain items in the questionnaire were modified with minor changes were made in order to improve clarity, readability, reliability and validity. The second iteration involved fifty academics from different disciplines, these are: information systems, business, finance, e-business, software engineering, marketing, accounting, pharmacy, medical sciences, acoustics, architecture and design, art, electronics and communication engineering, medical engineering, civil engineering, nursing, and electrical engineering. In the second iteration, there were some changes, giving us the confidence to issues the questionnaire to academics.
- Phase two, the questionnaire developed in phase one were emailed and posted to 9300 academics in 31 public and private universities in the developing countries. The questionnaires were mailed to academics in different faculties that covered a variety of disciplines from Agricultural and Biological Sciences, Arts and Humanities, Biochemistry, Genetics and Molecular Biology, Business, Management and Accounting, Chemical Engineering, Chemistry, Computer Science, Decision Sciences, Economics, Econometrics and Finance, Engineering, Mathematics, Medicine, Nursing, Pharmacology, Toxicology and Pharmaceutics, Physics, Psychology, Social Sciences, and Dentistry.
- Phase three represents data analysis of the questionnaires, results and discussion, limitations and possible future work. Of the 9300 questionnaires posted, 34% responses (3162) were received; 3% (94) were returned unanswered or incomplete. The latter category was ignored making the final number of usable responses 3068, giving a response rate of 31%. Data were analyzed using a combination of the parametric statistical methods and descriptive analysis. Academics were asked to select from the list the closest choice and to assign a weight of each publication difficulty factors. Each of the publication difficulty factors were measured using a weight scale (1 = not important and 10 = very important).

4. Results and discussion

The objectives of this project were: identifying publication difficulty factors that researchers consider when selecting an academic journal for submitting a research; assign a weight for each publication difficulty factor; develop a mathematical algorithm (equation) for journal selection that provide the best journal choice; and then test the mathematical algorithm for applicability and reliability purposes.

4.1 Publication difficulty factors

When the participants were asked about the importance of the publication difficulty factors; most of the academics in the sample reported that the most important publication difficulty factors were publishing in reputable journals that are indexed and abstracted in well-known databases, and the most important databases were found to be (Clarivate Analytics formerly Thomson Reuters (ISI), Excellence in Research for Australia (ERA), Association of Business Schools (ABS), SCOPUS, Elsevier. Furthermore, the second important publication difficulty factor was publishing in a journal that has an impact factor. However, the most least publication difficulty factors were found to be: number of issues per year of the journal and if the journal is an open access or with subscription.

4.2 Publication difficulty factors weight

When we asked the participants to give a weight for each proposed publication difficulty factor in the questionnaire, results showed that the highest weight has been assigned to indexing/abstracting in Clarivate Analytics formerly Thomson Reuters (ISI) (25%) and the second highest weight has been assigned to the impact factor as a publication difficulty factor (25%), (15%) if the journal is indexed or listed in ERA, (15%) if the journal is indexed in ABS, (10%) if the journal is indexed in SCOPUS, and (10%) if the journal is indexed in Elsevier as shown in Table 1.

Table 1. Publication difficulty factors and their weight

#	Publication difficulty factor	Publication difficulty factor weight	Publication difficulty sub-factor	Publication difficulty sub-factor weight
1	Journal is Indexed in well-known databases	75%	Thomson Reuters ISI	25 points
			Excellence in Research for Australia (ERA)	15 points
			Association of Business Schools (ABS)	15 points
			SCOPUS	10 points
			Elsevier	10 points
2	Journal has an impact factor	25%	IF (Thomson Reuters)	25 points
			SNIP/IPP	
			SJR	
Total		100%	100 points	

4.3 Proposed equation of publication difficulty factors

Based on the result in Table 1, the two most important publication difficulty factors when selecting an academic journal were (Abstracting/Indexing of the journal and the Impact Factor of the journal), however, the least important publication difficulty factors were (Acceptance rate / rejection rate, Number of issues/ year, Lag time to publication, Open access / subscription, and Article Processing Charge (APC)), the least important publication difficulty factors can be excluded from the mathematical algorithm. The proposed equation of journal's publication difficulty factors can be created as the sum of two publication difficulty factors these are: (journal is indexed in well-known databases, journal has an impact factor) as shown in Figure 2 and Figure 3.

$$JRpDF(j) = A/I(j) + IF(j) \dots\dots\dots \text{eq. 1}$$

$$JRpDF(j) = A/I(j) [75\%] + IF(j) [25\%] \dots\dots\dots \text{eq. 2}$$

$$JRpDF(j) = (ISI + ERA + ABS + SCOPUS + Elsevier) [75\%] + (IF + SNIP/IPP + SJR) [25\%] . \text{eq. 3}$$

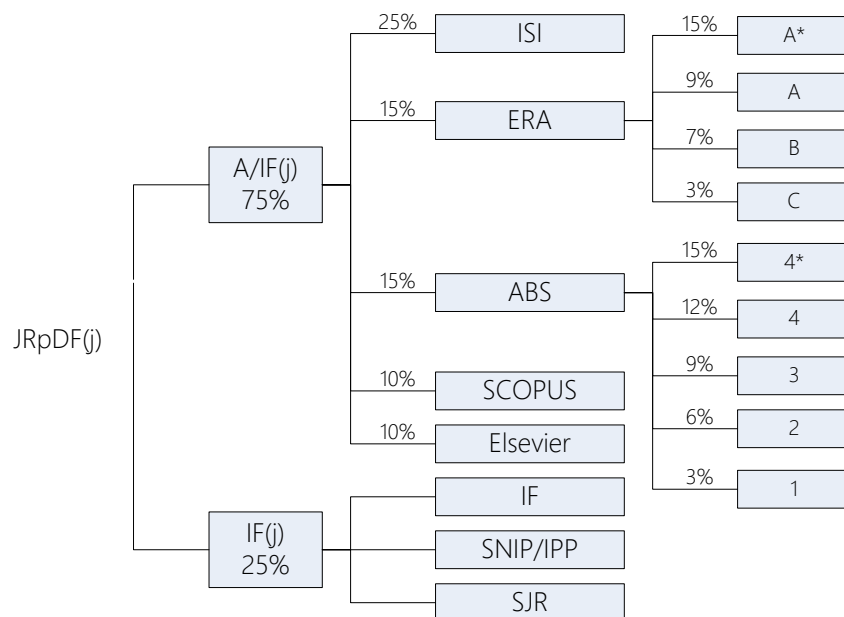
$$JRpDF(j) = (25\%ISI+15\%ERA+ 15\%ABS+10\%SCOPUS+ 10\%Elsevier) + (10\%IF+ 5\%SNIP/IPP+10\%SJR) \dots \text{eq. 4}$$

Where:

JRpDF(j): journal ranking based on publication difficulty factors

A/I(j): abstracting/indexing of the journal

IF(j): impact factor of the journal

Figure 2. Proposed mathematical algorithm of journal's rank based on publication difficulty factors**Figure 3.** Proposed mathematical algorithm of journal's rank based on publication difficulty factors**4.4 Proposed graphical model of publication difficulty factors**

The two main publication difficulty factors can be reorganized in a two dimensional graphical model, as shown in Figure 4, the first dimension is the journal impact factor, and the second dimension is journal abstracting/indexing. After applying the mathematical algorithm on the journals in the specified research field, it can be located using the model, as shown in Figure 5.

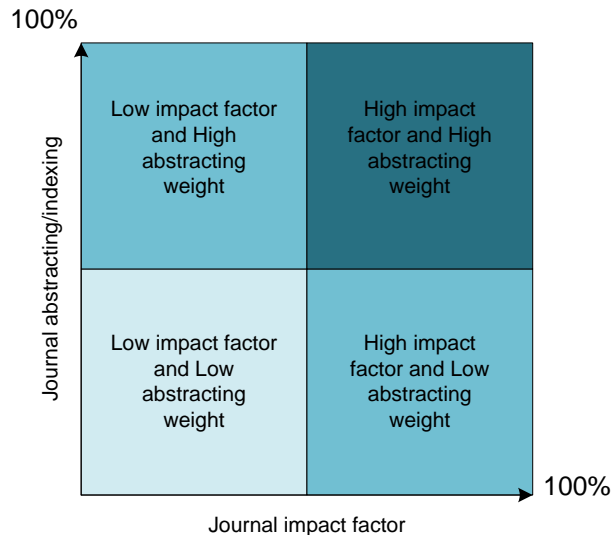


Figure 4. Graphical model of journal's rank based on publication difficulty factors

The graphical model includes 4 quadrants, the upper right quadrant in Figure 4 represents those journals that have a high impact factor and a high abstracting and indexing weight, journals in this quadrant are most likely to have a lower probability of acceptance. The upper left quadrant represents those journals that have a high abstracting and indexing weight but low or moderate impact factor. The lower right quadrant represents those journals that have high impact factor and low or moderate abstracting and indexing weight. The lower left quadrant represents those journals that have low or moderate impact factor and low or moderate abstracting and indexing weight, journals in this quadrant are most likely to have a higher probability of acceptance.

4.5 Testing the mathematical algorithm and graphical model

In order to test the mathematical algorithm, a sample of 13 journals were selected from Accounting and Finance discipline, these journals were selected randomly as shown in Appendix 1 and Appendix 2. Appendix 1 represents the basic information about the journals, such as: ISSN, journal title, indexing in (Thomson Reuters ISI, ERA, ABS, SCOPUS, Elsevier); further, it includes (impact factor of the journal IF, SNIP, and SJR).

In Appendix 2, the weight of each journal's publication difficulty factors has been calculated based on equation 4 (see Figure 2). If the journal is indexed in (ISI) then we assign a (25 points) for this journal; if the journal is indexed in (ERA) then we assign a weight based on the journal's rank in ERA: if the journal's rank is (A*) we assign a (15 points) to that journal, (rank A, we assign 11 points; rank B, we assign 7 points; rank C, we assign 3 points) (as shown in Figure 2), if the journal is indexed in (ABS) then we assign a weight for each journal based on the journal's rank in ABS: if the journal's rank is (4*) we assign a (15 points) to that journal, (rank 4, we assign 12 points; rank 3, we assign 9 points; rank 2, we assign 6 points; rank 1, we assign 3 points) (as shown in Figure 2), if the journal is indexed in SCOPUS, we assign (10 points) for the journal, if the journal is indexed in Elsevier, then we assign (10 points) for the journal, too.

Column 6 in Appendix 2 is equal to the summation of column (1, 2, 3, 4, and 5) as shown in Appendix 2, for example, journal 1 (ISSN: 0893-9454) has ISI (25 points) + ERA A* (15 points) + ABS 4* (15 points) + SCOPUS (10 points) + Elsevier (0 points) = (65 points), and journal 2 (ISSN: 0095-4918) has (48 points). In column 10, we calculate the average of (IF, SNIP, and SJR). In column 11, we calculate the impact factor weight for each journal in the following steps: first, we find the highest value in column 10 (which is 8.1457 for journal 8, ISSN: 0022-1082), secondly, we convert each value in column 10 to (25%) as mentioned in equation 4 by multiplying each value in column 10 by 25 and we divide the result on the highest value in column 10, for example, for journal 1 (ISSN: 0893-9454) =

$(5.3817 \times 25) / 8.1457$ which is equal to 16.51696 is the impact factor weight for journal 1, and we do the same for all journals.

In column 12 journal difficulty weight, we add column 6 (Abstracting weight for each journal) with column 11 (impact factor weight for each journal), for example, journal difficulty weight for journal 1 (ISSN: 0893-9454) = 65 + 16.51696 = 81.52, and journal difficulty weight for journal 2 (ISSN: 0095-4918) = 48 + 1.70336 = 49.70, and we calculate the journal difficulty weight for all journals. The last step, column 13, we assign a journal rank based on journal difficulty weight in column 12, from Appendix 2, journal 6 (ISSN: 0304-405X JOURNAL OF FINANCIAL ECONOMICS) has the highest journal difficulty weight (92.89) and its rank is 1, and journal 12 (ISSN: 1540-496X EMERGING MARKETS FINANCE AND TRADE) has the lowest journal difficulty weight (39.91) and its rank will be 13.

Figure 5 represents the journals under consideration, journal 2 and journal 12 have the least abstracting/indexing weight and impact factor as shown in the graphical model, however, journal 6 and journal 8 have the highest abstracting/indexing weight and impact factor.

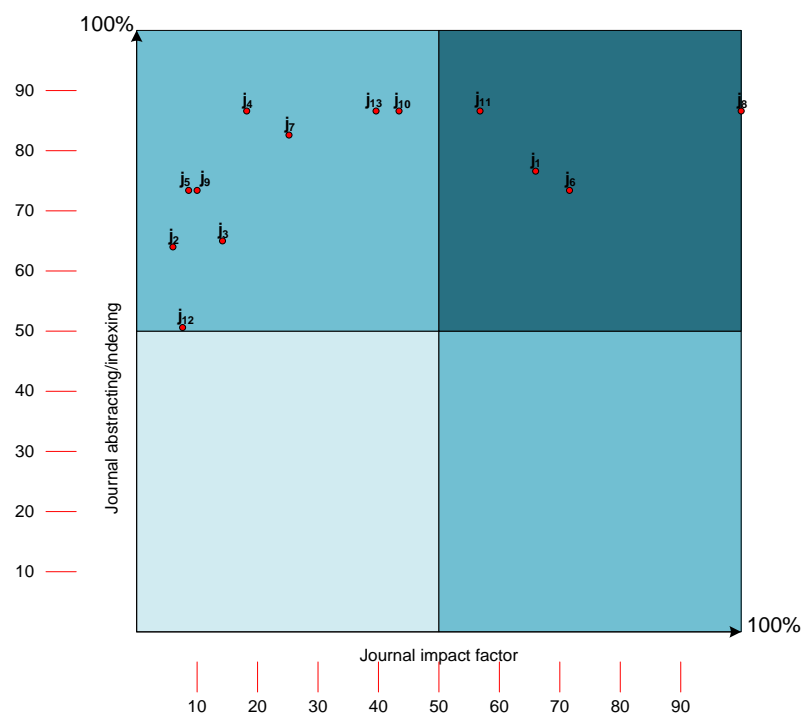


Figure 5. Graphical model of journal's rank based on publication difficulty factors

5. Conclusions

The aims of this research were to identify different publication difficulty factors that researchers in developing countries consider when selecting a journal to which to submit their research, further, assign weight or value for each publication difficulty factor in attempt to develop a mathematical algorithm for journal selection. Based on the literature from variety of disciplines, a comprehensive list of publication difficulty factors was developed for journal selection considerations. Publication difficulty factors have been organized into six major considerations: (Abstracting/ indexing; impact factor; acceptance/ rejection rate; number of issues/year; lag time to publication; open access/ subscription -article processing charges (APC)-. A questionnaire was developed and emailed to most academics in public and private universities in the developing countries. It is concluded that the requirements and regulations of higher education in the Middle East countries are mainly comparable, this affect the result of the survey that showed the two most important considerations when selecting an academic journal were (Abstracting/Indexing of the journal and the Impact Factor of the journal). Based on the data analysis, a mathematical algorithm developed and tested on a small

sample of journals, further, a graphical representation developed that assists researchers in comparing different journals.

5.1 Limitations and future work

The proposed mathematical algorithm (equation) is an attempt to help researchers in the developing countries to make a decision when submitting their work. However, the proposed mathematical algorithm has some limitations. The proposed mathematical algorithm could be suitable for researchers in the developing countries higher education institutes and cannot be generalized to other developed countries due to respondents' profile. Furthermore, the proposed mathematical algorithm needs enormous data to be available on each journal in the same research field under consideration in order to assign a rank for each journal based on publication difficulty factors, some data is not available to researchers. Lack of information about each journal makes it difficult to apply the mathematical algorithm by researchers.

Future work could be a data collection process about the scholar journals in the different disciplines in the developing countries universities. More importantly, it is hoped that this research project has encouraged other scholars to follow-up this research that will help the PhD students and researchers make an informed decision to select an appropriate academic journal to publish their research findings as it is one of the critical steps in publicizing research results.

Appendix 1

#	ISSN	Journal Title	Column number										
			1	2	3	4	5	6	7	8	9	10	11
			ISI	ERA	ABS	SCOPUS	Elsevier	Abstracting weight	IF	SNIP	SJR	Average of 7, 8, 9	Impact factor weight
1	0893-9454	REVIEW OF FINANCIAL STUDIES	yes	A*	4*	yes		65	3.119	3.101	9.925	5.3817	16.51696
2	0095-4918	JOURNAL OF PORTFOLIO MANAGEMENT	yes	B	2	yes		48	0.558	0.661	0.446	0.5550	1.70336
3	0047-259X	JOURNAL OF MULTIVARIATE ANALYSIS	yes	A	3	yes	yes	65	0.857	1.165	1.458	1.1600	3.560175
4	0261-5606	JOURNAL OF INTERNATIONAL MONEY AND FINANCE	yes	A	3	yes	yes	65	1.524	1.624	1.316	1.4880	4.566845
5	0270-7314	JOURNAL OF FUTURES MARKETS	yes	A	3	yes		55	0.698	0.912	0.52	0.7100	2.179073
6	0304-405X	JOURNAL OF FINANCIAL ECONOMICS	yes	A*	4*	yes	yes	75	3.541	4.028	9.92	5.8297	17.89193
7	0022-1090	JOURNAL OF FINANCIAL AND QUANTITATIVE ANALYSIS	yes	A*	4	yes		62	1.628	1.533	2.998	2.0530	6.300896
8	0022-1082	JOURNAL OF FINANCE	yes	A*	4*	yes		65	5.105	4.786	14.546	8.1457	25

9	0306-686X	JOURNAL OF BUSINESS FINANCE & ACCOUNTING	yes	A	3	yes		55	0.837	0.888	0.716	0.8137	2.497238
10	0021-8456	JOURNAL OF ACCOUNTING RESEARCH	yes	A*	4*	yes		65	2.243	2.649	5.733	3.5417	10.86979
11	0165-4101	JOURNAL OF ACCOUNTING & ECONOMICS	yes	A*	4*	yes	yes	75	3.535	3.507	6.834	4.6253	14.19569
12	1540-496X	EMERGING MARKETS FINANCE AND TRADE	yes	C		yes		38	0.768	0.716	0.383	0.6223	1.910014
13	0001-4826	ACCOUNTING REVIEW	yes	A*	4*	yes		65	1.953	3.237	4.478	3.2227	9.890739

Appendix 2

#	ISSN	Journal Title	Column number												
			1	2	3	4	5	6	7	8	9	10	11	12	13
			ISI	ERA	ABS	SCOPUS	Elsevier	Abstracting weight	IF	SNIP	SJR	Average of 7, 8, 9	Impact factor weight	Journal difficulty weight (6 + 11)	Journal Rank
1	0893-9454	REVIEW OF FINANCIAL STUDIES	25	15	15	10	0	65	3.119	3.101	9.925	5.3817	16.51696	81.52	4
2	0095-4918	JOURNAL OF PORTFOLIO MANAGEMENT	25	7	6	10	0	48	0.558	0.661	0.446	0.5550	1.70336	49.70	12
3	0047-259X	JOURNAL OF MULTIVARIATE ANALYSIS	25	11	9	10	10	65	0.857	1.165	1.458	1.1600	3.560175	68.56	8
4	0261-5606	JOURNAL OF INTERNATIONAL MONEY AND FINANCE	25	11	9	10	10	65	1.524	1.624	1.316	1.4880	4.566845	69.57	7
5	0270-7314	JOURNAL OF FUTURES MARKETS	25	11	9	10	0	55	0.698	0.912	0.52	0.7100	2.179073	57.18	11
6	0304-405X	JOURNAL OF FINANCIAL ECONOMICS	25	15	15	10	10	75	3.541	4.028	9.92	5.8297	17.89193	92.89	1
7	0022-1090	JOURNAL OF FINANCIAL AND QUANTITATIVE ANALYSIS	25	15	12	10	0	62	1.628	1.533	2.998	2.0530	6.300896	68.30	9
8	0022-1082	JOURNAL OF FINANCE	25	15	15	10	0	65	5.105	4.786	14.546	8.1457	25	90.00	2
9	0306-686X	JOURNAL OF BUSINESS	25	11	9	10	0	55	0.837	0.888	0.716	0.8137	2.497238	57.50	10

		FINANCE & ACCOUNTING														
10	0021-8456	JOURNAL OF ACCOUNTING RESEARCH	25	15	15	10	0	65	2.243	2.649	5.733	3.5417		10.86979	75.87	5
11	0165-4101	JOURNAL OF ACCOUNTING & ECONOMICS	25	15	15	10	10	75	3.535	3.507	6.834	4.6253		14.19569	89.20	3
12	1540-496X	EMERGING MARKETS FINANCE AND TRADE	25	3	0	10	0	38	0.768	0.716	0.383	0.6223		1.910014	39.91	13
13	0001-4826	ACCOUNTING REVIEW	25	15	15	10	0	65	1.953	3.237	4.478	3.2227		9.890739	74.89	6

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