Peer Review Interactions for Malaysian Journals: The Revamped Open-Peer Review Process

Jasni Ahmad and Norshuhada Shiratuddin

Abstract—**It is said that the new trend of journal publication is moving toward open-peer review (OPR), where interaction among authors, reviewers and readers is considered crucial to the article selection and publication process. To ascertain this notion, a study involving 13 refereed journals in Malaysia was conducted. The result shows that 84.6% of the journal administrators are interested to move from double-blind review to open peer-review process. Although this is the case, no guidelines or models, either conceptually or otherwise, exist to assist the journal administration to migrate. With the intention of providing such required guidelines and models, especially in the Malaysian environment, the concept of Revamped Open-Peer Review Process is proposed.**

Index Terms—**Open-review, Peer-review, Revamped Open-Peer Review Process**

I. INTRODUCTION

Peer review (known as refereeing in some academic fields) is a process of evaluating an author's scholarly work or ideas by others who are experts in the field [1]. It is used primarily by editors to select and to screen submitted manuscripts, and by funding agencies, to decide the awarding of grants [2]. Also the peer review process aims to make authors meet the standards of their discipline and of science in general. Publications and awards that have not undergone peer review are likely to be regarded with suspicion by scholars and professionals in many fields [3]. Normally the experts are known as reviewers. The groups involved in peer-review process activities are depicted in Figure 1.

Normally, peer-review will take much time starting from article submission until it is ready to be published by the publisher. During the reviewing process, editors will take responsibilities to reject or accept papers that present good or bad quality [4]. Some journals generally have a two-tier reviewing system as follow [5]:

1) In the first stage, members of the editorial board verify the paper's findings.
2) Papers that do pass this 'pre-reviewing' are sent out for in-depth review to outside referees.

Jasni Ahmad is with the Graduate Department of Information Technology, College of Arts and Sciences, Universiti Utara Malaysia, 06010 UUM Sintok, Kedah, Malaysia (corresponding author to provide phone: +604-9284785; fax: +604-9284753; e-mail: jasni@uum.edu.my).

Norshuhada Shiratuddin is with the Graduate Department of Information Technology, Universiti Utara Malaysia, Malaysia (corresponding author to provide phone: +604-9284700; fax: +604-9284753; e-mail: shuhada@uum.edu.my).

3) Even after all reviewers recommend publication and all reviewer criticisms/suggestions for changes have been met, papers may still be returned to the authors for updating.
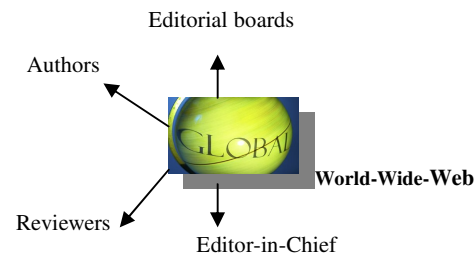

Fig. 1. Groups in peer-review process.

The international journals such as the *Journal of the American Chemical Society* (JACS), generally submit all papers for peer-reviewing to multiple reviewers. The reviewers will inform the editors on quality, correctness, and specific contents can be suit for publication in certain specialized journal. In this case, the journal editor may accept the forwarded articles without further reviewing [6].

More specialized scientific journals such as *Astrophysical Journal* and the *Physical Review* use peer review primarily to filter out obvious mistakes [7]. Normally, some journals have practice the double-blind peer review process to avoid any bias problem or conflict of interest during reviewing processes [8].

II. DISADVANTAGE OF DOUBLE-BLIND PEER-REVIEW

The current practice in the double-blind peer-review process assigns reviewers to the articles, and this is performed by the editors [9]. In this instance, the journal editors often invite the experts whom they consider qualified to scrutinize the work. In this case, sometimes conflict of interests might arise as a result of the editors choosing the wrong reviewers with mismatch expertise.

In addition, the anonymity in the double-blind peer review may also cause dissatisfaction among authors. For example, in some prestigious journals, the credentials and reputation of the reviewers are very important elements that most authors want to highlight. Knowing that the persons who review their papers are of high reputation can indeed increase the "value" of the articles. Also, if negative comments of the article are given by reviewers with high credentials, authors tend to gladly accept such comments, sometimes with pride [10].

A. Open Peer Review As A Solution

It has been suggested that traditional anonymous peer review lacks accountability, can lead to abuse by reviewers, and may be biased and inconsistent [11]. In response to these criticisms, the new trend known as open-peer review process (OPR) is proposed. OPR argues that the Internet can provide a better way to judge article quality using the opinion of every reader rather than that of only a couple of reviewers [12]. This new trend is making the full peer-review records public and opens the peer-review process to anyone who is interested to read an article and furnish some comments [13]. However, currently the OPR used to determine which articles are published in scientific journals is far from perfect.

There are different styles of OPR. For example, all articles submitted are published immediately and the review process takes place afterwards [12]. Reviews are displayed at the end of each article and this gives the reader criticism or guidance about the work. Readers also use reviews to guide what they read and the popularity of the works is easy to identify.

Another approach is a dynamical peer review site. It provides an opportunity for users to evaluate the reviews as well as the articles [13]. That way, with a sufficient number of users and reviewers, there should be a convergence towards a higher quality review process [14].

Other approach in OPR system is the authors have the opportunity to withdraw their articles, to revise it in response to the reviews, or to publish it without revision. Readers may see any negative comments along with the names of the reviewers, even if the authors proceed with the publication of the articles despite the critical comments [15]. In OPR system, expert commentaries are allowed and authors are encouraged to respond [16]. It also allows ongoing debate and criticism following publication [16].

Figure 2 depicts the three types of OPR discussed earlier. It then also, on the right hand side of the figure, suggests a Revamped OPR (ROPR).

To see whether OPR is indeed a possible solution in the eyes of scholarly journal publishers, a study was conducted among journal publishers in Malaysia and this is discussed in the next section.
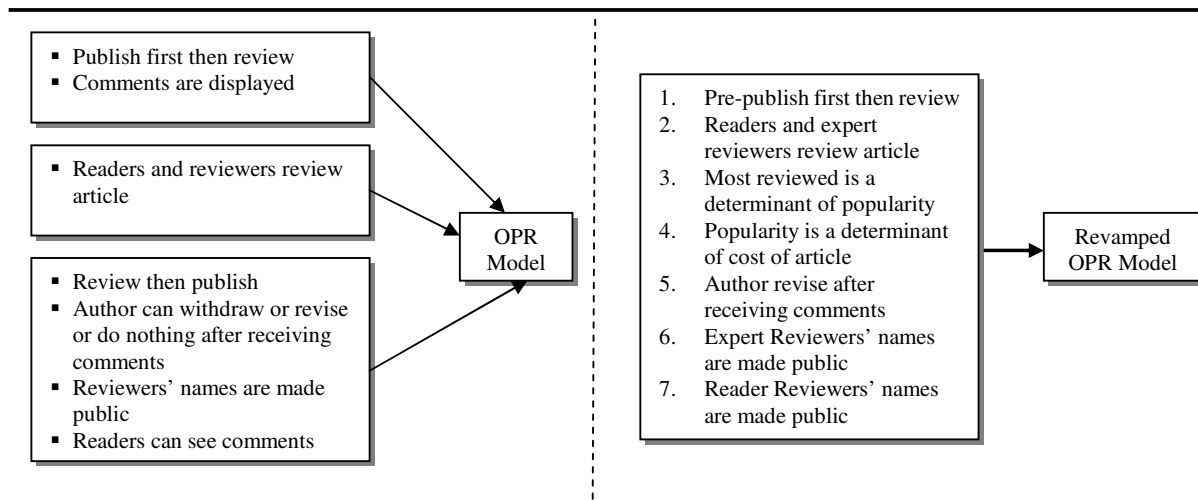

Fig. 2. Proposed revamped OPR conceptual model.

III. INTEREST OF PUBLISHER IN OPR

To ascertain the notion of increasing interaction among authors, reviewers and readers, a study involving 13 refereed journals in Malaysia was conducted. The primary method use was interview sessions with the editor-in-chief or the members of editorial board. The aim of the interviews was to record the perception and interest of the publishers on OPR.

Table 1 shows the numbers of journal produced in different medium of publishing both electronic or printed forms, and the current reviewing approach in the year 2007. From the table it can be seen that only 3 journals are publishing in electronic forms and 7 journals maintain the traditional printed forms. In addition, only 2 journals are disseminating in both medium. Referring to the reviewing approach, only 1 journal assigned one reviewer to review twice, but the others assigned two reviewers per article.

Another aim of this study was to investigate the numbers of respondents with the prior knowledge of the concept of open-peer review. About 84.6% of respondents have never heard the concept of OPR, however once explained they stated that they have intention to move from the double-blind review to the OPR (see Table 2).

The research also highlighted some problems in managing the current reviewing process such as increasing the cost, the delays of paper submission among authors, reviewers, and editorial board, and difficult to find the potential reviewers for certain article (7.7%). Through this study, it is confirmed that many journals have intention to implement OPR, however, no guidelines or models, either conceptually or otherwise, to better support their intention to migrate exist.

Table 1. Background of journals utilized in the study.

Journal	Delivery Mode			Review Approach		
	Electronic	Print	Electronic and Print	Double-blind review	Open-peer review	Number of Reviewers
1. Malaysian Management Journal			√	√		2
2. International Journal Management Studies			√	√		1
3. International Journal of Bank and Finance		√		√		2
4. Journal of International Studies		√		√		2
5. Malaysia Journal of Pharmaceutical Sciences		√		√		2
6. Asian Academy of Management Journal		√		√		2
7. Journal of Construction in the Developing Countries		√		√		2
8. International Journal of Asia-Pacific Studies	√			√		1 to 3
9. Progress Food Biopolymer Research	√			√		2
10. Journal of Bioscience		√		√		2
11. Journal of Advancing Information and Management Studies	√			√		2
12. Journal of ICT		√		√		2
13. Malaysia Journal of Learning and Instruction		√		√		2

Table 2. Journals interested to implement OPR.

Journal	Intention to move	
	Yes	No
Malaysian Management Journal	√	
International Journal Management Studies	√	
International Journal of Bank and Finance	√	
Journal of International Studies	√	
Malaysia Journal of Pharmaceutical Sciences	√	
Asian Academy of Management Journal	√	
Journal of Construction in the Developing Countries	√	
International Journal of Asia-Pacific Studies		√
Progress Food Biopolymer Research	√	
Journal of Bioscience	√	
Journal of Advancing Information and Management Studies	√	
Journal of ICT	√	
Malaysia Journal of Learning and Instruction		√

IV. DISCUSSIONS

We propose a ROPR model with the intention to provide a solution to the existing problems of the double-blind peer review process. The 7-steps of the ROPR model as shown in Figure 2 are seen as able to:

1) **Provide a scholar forum** between authors, readers and reviewers. This will benefit both parties and caters many problems such as conflicts of interest and misunderstanding on reviewer's comments.

2) **Reduce the editor's workload**. Editors will spend less time in finding reviewers. Also, the probability of editors getting reviewers with expertise in particular area is also high.

3) **Improve the article quality**. Since it is expected that comments can come from both the expert reviewers as well as the readers, then it is safe to conclude that the quality of the article can be improved when more sound and valid comments are taken into account [17].

4) **Enhance journal publication process.** Through the use of computer technology and the development of a web-based journal management system, the publication process can be better managed and enhanced.

5) **Intensify the interactions** among authors, readers and reviewers, and indirectly the editors too. In fact, readers and reviewers with different nationality and culture can work together to improve the work in their field [18]. See Figure 3.

Fig. 3. Interactions among authors, readers, reviewers, and editors are intensified.

V. CONCLUSION

This study suggests a ROPR conceptual model for journal reviewing process. The model should support several novel activities in reviewing process such as ensuring the quality of reviewers. It also allows the criticism by reader, whereby the readers will too have the opportunity to evaluate the articles. With a sufficient number of reader and expert reviewers, the quality of the reviewing process may be higher. A study was conducted involving 13 refereed journals in Malaysia in order to ascertain their interests in the ROPR concept. The result shows that 84.6% of the journal administrators are interested to move from the double-blind review to open peer-review process.

We also argue that by implementing the ROPR model, the interactions among authors, readers, reviewers and editors are intensified. This should benefit many parties who are working together to improve the work in their specific fields.

The proposed model is in its inception stage. The detail breakdown of each of the 7 steps will be finalized soon. Then, the conceptual model will be validated by prototyping techniques. A working prototype that implements all the steps will be developed and tested with a number of selected journal publishers among the 13 who participated in the study discussed in this article.

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