Implementation of Online Reading Assessments to Encourage Reading Interests

Endang Yuliani Rahayu1 & Herni Februariyanti2

1 School of Language and Culture, Stikubank University, Semarang, Indonesia
2 School of Informatics Engineering, Stikubank University, Semarang, Indonesia

Correspondence: Endang Yuliani Rahayu, School of Language and Culture, Stikubank University, Jl. Tri Lomba Juang No.01 Semarang, 50241 Indonesia Tel: 62-856-4121-2789. E-mail: tugasyuli011@gmail.com

Received: August 25, 2015   Accepted: October 10, 2015   Online Published: October 19, 2015
doi:10.5539/elt.v8n11p197       URL: http://dx.doi.org/10.5539/elt.v8n11p197

Abstract
The current study reports a two-year research project funded by the Government of the Republic of Indonesia through a competitive research scheme. The aim is basically to respond to the fact most university students have very low interests in reading activities, such as finding out important information for their term papers as assigned by the lectures. Instead, most of the time is spent in BBM, iPhone chats and Facebooking of non-academic nature (mostly social encounters). This has triggered a team of researchers to find out ways to increase or encourage reading interests. Internet browsing was undertaken to search for possible software application systems which could be used to administer online assessments in reading class. It was Question Writer (QW3.5) selected for use in the current study. It is a paid software application system especially developed for online assessments. It can perform various types of question formats with the students’ responses directly forwarded to the teacher’s email, and feedbacks and scorings automatically performed by the system. In the current study, a discussion group called ‘Reading Maniacs’ was created in Facebook for the students to get access to both reading materials and assessments. Questionnaire and interviews were conducted to investigate how the students got motivated in reading class and if their reading interests got increased. The findings indicate that the students were very motivated to participate in the online assessments supported by Facebook group discussion, thereby their reading interests leveled up. It was therefore recommended that online assessment of reading skills be conducted as additional activities to the well-supervised offline reading examination. Future researchers may want to administer Questionnaire to the reading teachers to get some feedbacks.

Keywords: online assessment, reading interests, software application, facebook group discussion

1. Introduction
1.1 Background
English language teachers or possibly any other teacher of humanity disciplines have worried a lot over the low level of reading interests. It was claimed (Kusmana, 2009) that Indonesia was at the lowest level of reading interest among other East Asian countries—only 30% of the text can our students absorb. This represents a warning that our students are of low literacy level. Meanwhile, it is commonly realized that reading is one of language skills that has been introduced at the beginning of language learning period. Reading is important for all ages, (Harmers, 2003, p. 190 ) states that reading is an exercise dominated by eyes and brain. The eyes receives messages then the brain has to work out the significant of these messages.
Reading (aloud) has been considered as the way for the learners to practice their pronunciation as well as comprehension. Thus, reading contributes significantly to the development of the speaking skills with regards to pronunciation. Reading and speaking activities can be made integrated (Zhang, 2009). In addition, it is argued (Reading is very important in the process of teaching and learning language since it will give the learners chance to develop their reading strategy and acquire knowledge about many things according to their interest and purposes (Harmer, 2003, p. 210). Therefore, reading may provide learners with wide range of knowledge and reference.
As reading is really important for successful university students, they must be equipped with this skill. Furthermore, in order to get maximum benefit from their reading, the students need to be involved in both extensive and intensive reading. Dealing with extensive reading, the teacher can encourage the students to choose for themselves what they should read and to do for pleasure and general language improvement (Bell, 1998). Meanwhile, on intensive reading the teacher chosen and directed and is designed to enable the students to develop their specific receptive skills.

The above two controversial facts about reading, we, a team of researchers, were triggered to create a sort of breakthrough on how to upgrade the students’ reading interests through the development of Online Reading Assessment (ORA), in addition to the existing off-line reading assessments by means of which no e-books are left ‘unclicked’ and no textbooks in the library shelves are left untouched.

1.2 Statement of the Problems

Based on the background, the research questions can be formulated as (1) ‘What software application system can be employed to upgrade the students’ reading interests?’ and (2) ‘How are the reading materials integrated in the system as a means of online reading assessment to upgrade the students’ reading interests?

In this respect, a model of online reading assessment has to be devised and its effectiveness tested in order to come up with a rigid model which can be used in different EFL contexts throughout at least Central Java. The steps employed in devising a model included (1) Exploration Phase in which internet browsing was performed to select one software application (among many) to be used in the current study. (2) Model Development Phase in which the model of online reading assessment was designed, and (3) Model Evaluation in which the model was tested in a narrow scope to find out its effectiveness.

2. Method

2.1 Research Design

The current study was Research and Development (R & D) in nature. As outlined in Borg and Gall (2007), R & D is a process of investigation employed to develop and validate or test a product (of education). To accomplish the study, the researchers have, therefore, to conduct a needs analysis on which to design the product, and to test its effectiveness so as to be used for a more general scope (Sugiyono, 2009).

In the current R & D, the product developed and validated to upgrade the students’ reading interests consists of (1) Facebook group discussion called “Reading Maniacs” (2) a paid software application into which reading assessments are integrated (3) a report of validation of the model to upgrade the students’ reading interests.

2.2 Data Collection

The techniques of data collection were internet browsing for a suitable software application, library studies and focused group discussion (FGD). The three techniques were collaborative in nature in order to obtain the valid data. Library studies were used to obtain the suitable materials for online reading assessments. Meanwhile, FGD (practitioner and expert judgments) was used to provide inputs for the current model of online reading assessments.

2.3 Research Procedures

Modified from Borg and Gall (2007)’s ten phases, the current study was performed in seven phases, namely (1) research and information collecting, (2) developing a preliminary form of product, (3) preliminary field testing, (4) main product revision, (5) main field testing, (6) final product revision, and (7) dissemination and implementation. The current report is the report for research project year 2, which is more focused on the last two phases, to recommend the product for a wider use.

Only very recently has the product of the research—model of online reading assessment been launched for use in three faculties in Stikubank University, namely the faculty of language and cultural studies, the faculty of economics and business studies, and the faculty of informatics. One English reading class was selected from each faculty to participate in the use of online reading assessment project to find out how it worked. Each student was supposed to join Facebook Group Discussion, referred to as “Reading Maniacs” to participate in ORA. Each week, a new reading material was uploaded; there were 12 weeks in one semester, thus, there were 12 materials all together, covering the question types, such as Multiple Choice, True-False, Matching, Sequencing, and Essay. Responses were automatically sent to the teacher’s email. Feedbacks for the students were set at the end of each session and were freely accessed by students upon completion of the test.
At the end of the semester, questionnaire focusing on the nature of ORA in relation to its effectiveness to encourage the students’ reading interests was administered to the three English reading classes (40 respondents) to find out the students’ perceptions of the assessment model. Interviews to selected students (6 interviewees) from the three faculties (of Law, Economics and Business Studies, and English Literature) were conducted to convince the results of the current study.

3. Results

3.1 Evaluation of Software Application System

The choice of Question Writer (QW3.5) was not meant for its marketing purposes. The researcher team has no business connection with QW3.5 developer. It was just a purchase of the software based on careful investigation and evaluation of the software performance. It turned out that the software met the feature requirements as set by the researcher team, and outlined below:

1) The software can accommodate various types of questions, such as multiple choices, multiple choices with credits, blank-filling, sequencing, matching and essay.

2) The students’ responses are automatically scored and directly forwarded to the teacher’s email, except for the essay type; the scoring is left to the teacher who then can use a special rubric to score the essay.

3) There is an unlimited space to store both the questions and the students’ responses in a program called “question writer tracker”. This is good for assessment of a large number of students.

4) The questions are editable at any time with or without any feedback for the correct answer. It is up to the teacher whether or not a feedback feature is set.

5) The current study made use of question writer (QW3.5). It is possible for upgrade to a higher series, for example QW4.5.

It should be re-stressed that the current study is by no means for promotional (marketing) of the software. Other software application systems may of course be used as far as the features meet the required criteria for efficiency. More similar software application systems may be available. The choice of QW3.5 was partly due to ease of operation and administration.

3.2 Sample of Online Reading Assessments

Below are examples of online reading assessments (True-False and Multiple Choice types). The students were exposed to a reading text displayed on the screen. After a defined period of time, each student with his or her own laptop was supposed to get access to ‘questions’ located at Facebook group discussion entitled “Reading Maniacs”. Of course it was possible for the students to reread the text as it was displayed during the learning and teaching processes. At one time or another, the text was also posted in Facebook group discussion for the students who might want to get access to the materials outside the reading class.

3.2.1 True-False Type

The students simply click on the alternative according to their comprehension about the text. To continue doing the text, they simply click the ‘next’ button. Then, the next question appears for the students to do. This also applies to the multiple choices types of test.
As outlined above, more test types, such as sequencing, matching, and essay can be made on Question Writer software (CW.3.5). For matching and sequencing, dragging one item to match or sequence with the “suitable pairs” is required of the students in order to do the test. Meanwhile, for essay test, the students will have to type the responses on the spaces provided. A specially designed rubric must be devised to score the essay type test.

The students’ responses were automatically scored (except for essay) and sent to the teacher’s email as shown in the setting below:

3.2.3 Properties Window

ORA’s properties can be set as required by the teacher for efficiency purposes.
From Figure 3, it is clear that the teacher can set ‘the properties’ of the software, one of which is to send the results (of the test) to the teacher’s email in addition to the other properties (1) sending result before showing any feedback, (2) using a custom result server—for a large number of students, and (3) using a custom result backup server.

In addition, to minimize cheating among the students, all question items and the alternatives can be randomized. Individual student would get access to a different format of the test. Below is an example of setting (randomized).

From Figure 4, it is clear that more possibilities for settings, such as (1) show question number, (2) randomize question option, (3) display Title with each question, (4) use image zooming, (5) never show back button with questions, and (6) force attempt at every question.

3.2.4 Feedback
Feedback to each student is shown at the end of the test. It depends on the teacher’s policy for the students whether they have to retake the test or not upon failure.
From Figure 5, it is clear that the student failed. With only 30%, he or she was not able to reach the minimum overall score of 80% with the passing score of 75. Therefore the test status is Fail; Message= Failed.

3.3 Students’ Perceptions in the Use of Online Reading Assessments

3.3.1 Questionnaire-Based

The questionnaire consisted of fifteen statements regarding the online reading assessments (ORA). There are five options for the students to choose, (1) strongly disagree, (2) disagree, (3) neutral, (4) agree and (5) strongly agree. The results of the first five statements are tabulated below:
Table 1. Questionnaire results

<table>
<thead>
<tr>
<th>No</th>
<th>Statements</th>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
<th>Σ</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Online Reading Assessment (ORA) supports the new paradigm of language testing</td>
<td>16</td>
<td>84</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>2</td>
<td>Computer literacy with respect to the administration of ORA is at the appropriate level.</td>
<td>65</td>
<td>30</td>
<td>5</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>Quick scoring and direct feedback are good features of ORA.</td>
<td>11</td>
<td>89</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Personally, I was very much at ease doing the test without technical problems.</td>
<td>87</td>
<td>13</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Test validity and reliability are questionable since ORA may be done by someone else.</td>
<td>76</td>
<td>24</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

5=strongly agree; 4=agree; 3=neutral; 2=disagree; 1=strongly disagree.

From Table 1 above, it is clear that ORA supports or is in line with the new paradigm of language teaching. The respondents (16%) expressed strong agreement, while the other group (84%) agreed to the statement. Even, it is argued that later on paper-based TOEFL would soon be replaced by TOEFL iBT. Therefore, it is a good idea to start with Online Reading Assessment (ORA) as starting exercises.

With respect to computer literacy required in order to be able to do ORA, 65% of the respondents felt that they were appropriately equipped. This is logical since almost everyone is computer literate at least at users level. Other respondents (30%) stayed neutral, representing the fact that they might still need practicing in doing ORA. Still others (5%) expressed disagreement. This group of respondents might have problems doing ORA, such as dealing with slow internet access and possible technical constraints. From this point, it is clear that doing online tests not only requires the ability to do the test ‘materially’ but also a certain level of computer literacy. A particular individual may get ‘failed’ without possessing sufficient computer literacy even though he or she may have reached a considerable degree of language proficiency.

Strong agreements were expressed by the respondents (11%) with respect to the fact that quick scoring and direct feedback were competitive advantage over the off-line (paper-based) test. The other respondents (89%) further strengthened the fact. There are of course so many advantages of implementing ORA that, later on, regarding language proficiency tests, online testing systems would take over off-line testing systems in accordance with the advanced development of information technology.

With respect to the perception of each individual in doing ORA, 87% of the respondents felt at ease and the other 13% remained neutral. It is understandable that the students in terms of their computer literacy mastery, found it easy technically to do ORA.

As an assessment, the use of ORA remained questionable regarding the results of the test, whether it has achieved the goal of the test—to locate the students within an appropriate level of proficiency. This was proved by 58% respondents who agreed with the statement that ‘Test validity and reliability are questionable since ORA may be done by someone else’. The other respondents (42%) remained neutral. It all has something to do with the students’ character building—to remain honest.

Tabulated below are the results of the next five statements of the questionnaire.
Table 2. Questionnaire results

<table>
<thead>
<tr>
<th>No</th>
<th>Statements</th>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
<th>∑</th>
</tr>
</thead>
<tbody>
<tr>
<td>6</td>
<td>ORA must be done at the same time by the students</td>
<td>33</td>
<td>67</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>7</td>
<td>Special rubric must be established for essay-scoring</td>
<td>78</td>
<td>22</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>8</td>
<td>ORA may be done off campus.</td>
<td></td>
<td></td>
<td></td>
<td>89</td>
<td>11</td>
<td>90</td>
</tr>
<tr>
<td>9</td>
<td>ORA is not recommended for final scoring and grading.</td>
<td></td>
<td></td>
<td>21</td>
<td>79</td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>10</td>
<td>ORA is best recommended for supplementary use.</td>
<td>72</td>
<td>28</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
</tbody>
</table>

5=strongly agree; 4=agree; 3=neutral; 2=disagree; 1=strongly disagree.

One advantage of using ORA is that the test may be done at different times by different students. It is therefore logical that 67% of the respondents did not agree that ORA was done at the same time. The other 33% of the respondents remained neutral. The respondents who were neutral might think that ORA was flexible with regards to its administration.

One constraint of ORA is that it cannot score ‘essay type test directly. The students’ essays were sent to the teacher’s email but remained unscored; therefore most of the respondents (78%) totally agreed that special rubric had to be devised to handle essay-type test. The other 22% of the respondents agreed to this.

Similar to Statement 6, ORA may be done off-campus. However, 89% of the students remained neutral with 11% disagreement. It is possible that the students may ask other people to do the ORA on their behalf. This might be considered as the disadvantages of ORA. It is also related to Statement 9 that ORA is not recommended for final scoring and grading. Only 21% agreed to this with the other 79% at neutral position. It can therefore be inferred that ORA at the moment is best used as a supplementary testing. It was supported by 72% agreement and 28% at neutral position.

Tabulated below are the results of the final five statements of the questionnaire.

Table 2. Questionnaire results

<table>
<thead>
<tr>
<th>No</th>
<th>Statements</th>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
<th>∑</th>
</tr>
</thead>
<tbody>
<tr>
<td>11</td>
<td>Both items and alternatives can be randomized, indicating good features of ORA.</td>
<td>10</td>
<td>90</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>12</td>
<td>ORA’s time-based feature is similar to TOEFL iBT</td>
<td></td>
<td></td>
<td>92</td>
<td>8</td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>13</td>
<td>It is recommended ORA be used in place of paper-based test</td>
<td></td>
<td></td>
<td>84</td>
<td>16</td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>14</td>
<td>The students’ reading interests increase in response to the use of ORA.</td>
<td></td>
<td></td>
<td>21</td>
<td>79</td>
<td></td>
<td>100</td>
</tr>
<tr>
<td>15</td>
<td>ORA is recommended as it encourages the students themselves to equip themselves with sufficient computer literacy level</td>
<td>11</td>
<td>89</td>
<td></td>
<td></td>
<td></td>
<td>100</td>
</tr>
</tbody>
</table>

5=strongly agree; 4=agree; 3=neutral; 2=disagree; 1=strongly disagree.

Another competitive advantage of ORA is that both question items and alternatives can be randomized to avoid the same forms of questions done by different students. This feature was considered good by 10% total agreement and 90% agreements. In this case, cheating can be somehow minimized.

ORA is time-based test and is therefore similar to TOEFL iBT. Therefore, ORA somehow helps the students get familiar with TOEFL iBT. Most of the respondents (92%) agreed to this with only 8% at neutral position. Furthermore, 84% of the respondents agreed to the recommendation that ORA replace the paper-based test of reading comprehension; 16% of the respondents remained neutral.
The aim of the test to increase the reading interests of the students is somehow successful as 21% of the respondents totally agreed that ORA increased the reading interests (the other 79% of the respondents agreed). This is also an indicator that most of the students are computer literate. Those students with sufficient computer literacy felt very much encouraged to do ORA as supported by 11% total agreements and 89% agreements—with respect to level of computer literacy.

3.3.2 Interviews-Based Perceptions

As outlined above (Method), six students were picked up for interview to convince the results of the questionnaire. Most of the students responded positively to ORA as a supplementary test in addition to the traditional off-line reading assessments. Only one student maintained that honesty was still questionable since such an online test could be done by someone else—to be warned that Indonesian students were very cooperative, negatively including doing exams for other people. Most importantly, ORA was agreed to be able to increase the reading interests—strongly supporting Statement 14 in the Questionnaire.

All agreed though that ORA was a good exercise for the students since they may at one time or another take TOEFL iBT where everything is done online. Even it is assumed that paper-based TOEFL will be put to its end, meaning that in the future, TOEFL will be internet-based.

The interviewees also expressed satisfaction with respect to the administration of ORA, including the use of Facebook group discussion as a medium of interaction between the teacher and the students in addition to between students and students. It was also agreed that the testing materials had to be varied, making the best use of all facilities that the software offered. Updates should be done on a regular basis to comply with the demand for modern testing, evaluation and assessment.

4. Conclusion and Recommendations

Much has been discussed on the implementation of software application system for the development of language skills, such as reading, which is thought of as the mother of learning. Without reading it is hard to imagine how knowledge can be preserved and shared. The integration of online reading assessments (ORA) into a software application turns out to be well appreciated by the students as a means of upgrading their reading interests. This is in line with the current era of cyber technology. Furthermore, online reading assessments can be accessed via desktop computer, laptop, gadgets or even smart mobile phones. Thus, it really encourages freedom of modes of teaching and learning. In other words, interaction between the teacher and the students does not have to be face-to-face interactional mode. Another good point with the use of online reading assessments is that busy students—those who are also working—can still get access to the assessments within a defined period of time. In other words, they do not have to take the test at the same time.

It is therefore recommended (1) that teachers develop other online assessments in relation to the improvement of other language skills (2) that the students’ participation in such a type of assessments must be based on supreme honesty since it is possible that this kind of assessment, due to the online nature, can be done or performed by other individuals for and on behalf of particular students. For this, it is necessary that the teacher set a time limit, for example, the test should be done on a specific date, at specific time. Still another recommendation of relevance, considering that the questionnaire was only administered to the students, is that future researchers may want to administer specially designed questionnaire to the reading teachers to obtain their feedbacks

Acknowledgements

Sincere thanks shall go to all students of the three faculties who have been involved in questionnaire, interviews, and focused group discussion. The researchers are also indebted to the Directorate General of Higher Education for provision of the research grants.

References


**Copyrights**

Copyright for this article is retained by the author(s), with first publication rights granted to the journal.

This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution license (http://creativecommons.org/licenses/by/3.0/).