Designing and implementing ELE quizzes for learning and assessing: a positive experience with listening comprehension e-tests in Modern Languages

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Abstract

We mainly use ELE to organise and share module information with our students or to facilitate collaborative work or group discussions. We can also use it to build online formative and summative e-tests using the Quiz tool; however, this option seems less used. In this article I will share my positive experience creating and implementing ELE quizzes in a Spanish Language module and the expertise I gained. My aim is to encourage other colleagues to explore this tool further and to start implementing it in their courses.

Keywords: e-assessment; e-learning; ELE; quiz; modern languages; listening comprehension

Introduction

In this article I will present my first experience of designing, implementing, monitoring and revising three formative Listening Comprehension (LC) e-tests on ELE and will share the lessons I learned during the journey. In the rationale I discuss my decision to create these e-tests and how I started the design process. Then, I will present the approach I followed when designing the quizzes – both at the beginning of the process and at a later stage – and after, I will explain the possibilities that this type of e-assignment offers, focusing on the variety of question types that students can be asked to complete, the different forms of marking and feedback that the students can receive, and the ways in which lecturers can visualise students’ performance in the e-tests and their results. Later, I will discuss the advantages and disadvantages of using these e-tests for both lecturers and students, and will also mention a few considerations that can be useful when designing and implementing formative or summative ELE quizzes. Finally, I will conclude with a summary of the main benefits of using ELE quizzes for learning and assessing and will offer an invitation to every lecturer to explore how to build a quiz via a short online video tutorial.

Rationale

My ‘adventure’ with ELE quizzes started while I was attending the PCAP course at the University of Exeter. I had always been interested in e-learning and e-assessing but had never had enough time to study the subjects properly and to implement these new approaches systematically. So, when I was

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asked in PCAP Module 3 to research an aspect of my professional practice that needed improvement, I immediately thought of those areas.

I met with Ms Isabel Moros (Senior Language Lecturer and Senior Language Coordinator) to discuss views on how my research on e-assessment could benefit the different modules and stages of study, and concluded that module MLS1001 (Spanish Language for Post A-Level 1st Year students) would benefit most from it. The reason was that students’ results on the e-tests used in 2013-13 showed that the vast majority had achieved very high marks, which was unrealistic. This indicated a need to revise and extend the tests in order to improve their validity, effectiveness and reliability when assessing our students’ listening comprehension skills at a B2 level of the CEFRL. Following the discussion, Ms Isabel Moros invited me to engage with her in a new scholarly project which involved critically analysing those e-tests, identifying their possible weaknesses and designing new ones for the academic year 2013-14. Additionally, she wanted me to explore and implement other possibilities that ELE quizzes offered to make the e-test more challenging but that had not yet been used. This project would help us to obtain a more reliable source of assessment and would help students to develop further their listening skills and become familiarised with the summative assessment, which would also be conducted via an ELE e-test.

So, following that analytical approach, I created three new formative e-tests during the summer of 2013, presented this experience as my PCAP assignment and implemented them during 2013-14.

1. Analytical approach to the design of the three formative e-tests

The initial design

I started the journey knowing that, according to Alderson and Bachman, ‘the assessment of listening abilities is one of the least understood, least developed and yet one of the most important areas of language testing and assessment […] very little is written in the language assessment literature on the specific constructs, or abilities, that underline listening, on how to go about designing listening assessment procedures, on how to validate and evaluate listening tests’ (Maíz and Domínguez 2009). Also, that according to Buck ‘listening is a complex, multi-dimensional activity, and performance on listening test tasks requires a complex combination of knowledge, processing skills and strategies’ (Maíz and Domínguez 2009).

In order to learn about e-assessment, I enrolled in an online course on ‘Tutoring and creating online courses’ run by the Instituto Cervantes in Leeds, where I learned how to use some of the available tools in Moodle platforms, like ELE, to create e-tests. I also attended an ASPIRE lunch seminar on ‘Creating e-learning content’ where I learned of some other possibilities outside ELE.

In order to design effective and objective tests to assess the different LC skills acquired by MLS1001 students, I first went through the 2013-13 materials. Then, I studied and reflected on the literature

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2 The Common European Framework of Reference for Languages.

3 The Instituto Cervantes is the official institution of the Spanish Government that promotes Spanish language teaching and learning, and knowledge of the cultures of Spanish speaking countries throughout the world. From http://leeds.cervantes.es/en/about_us_spanish.htm
about traditional LC assessment designing (Kohonen 1999, Martín 2010, Rodríguez, Maíz and Domínguez 2009, Pastor 2009), some examples from different exam boards\(^4\), course books (VVAA 2007) and websites\(^5\), and the essential aspects and steps that other practitioners and the CEFRL advised to follow when designing LC tests, paying special attention to those articles referring to what makes a test harder, as this was what we were trying to achieve (Pastor 2009). For my PCAP assignment I critically analysed these sources in the section ‘Discussion of the literature on the subject and how I applied it to the assignments I created’.\(^6\)

Regarding the literature specifically related to e-assessment, as opposed to traditional assessment, I found interesting articles (Lowri 2009), however, nothing specifically related to assessing LC skills online. So, I based the design of my quizzes on the published online examples above-mentioned, the content of the courses I attended, the Moodle website and the advice of Mr Richard Holding (Educational Technologist) who was extremely helpful during the whole process.

My next step was to search for appropriate audio texts as, according to Martín, the text is the key in a LC exam (Martin 2010). I looked for texts that matched the recommendations learned in the literature and also suited our student needs, fitting the course aims and contents and, finally, I created the tasks, questions and instructions on ELE, following the recommendations.

**The implementation, monitoring and revision of the three formative e-tests**

Designing three e-tests for the first time was an exciting yet laborious process, but not the end of the project. After every test was implemented, I analyzed what had worked on that e-test and what had been the pitfalls in order to avoid them in the following e-test.

Once the first e-test was implemented during Term 1 and the results were available, I had the chance to analyse my students’ performance in every task they were asked to complete and the marks they achieved. This analysis suggested that, again, the assessment was not challenging enough for students. This was due to the fact that I had given them too much time to complete the e-test and more than one attempt to do so. So the overall mark for that e-test was generally very high, which meant that I had to revise and improve the second e-test, ready to be implemented in Term 2. Also, I wanted to include one new option that I had not used before: a question where students had to watch a video and answer some questions about it. The results showed that this e-test was certainly more reliable than the previous one; however, after asking students for their feedback on the experience of completing the e-test, 5 (out of 107) mentioned that they had experienced technical problems when attempting to view the video. This made me realize that e-test 3 needed to be completely changed, as all the questions were based on videos. So, I redesigned the e-test, this time including elements that had worked in the previous e-tests and avoiding those that had not worked.

\(^4\) Diploma de Español como Lengua Extranjera (DELE) and Certificate of Proficiency in English (CPE).

\(^5\) **Ver-taal, Practica Español - CVC Instituto Cervantes and Sintonía con el español – CVC Instituto Cervantes.**

\(^6\) For those language lecturers interested in LC assessment, I have added a shorter version of that section in the Appendix.
My conclusion from this experience was that using quizzes as a form of formative assessment would require dedication and motivation to go through a constant learning curve until the ideal e-test was achieved. This may be one of the main disadvantages; however, the result of these initial trials will result in a highly effective, reliable, valid and trouble-free summative e-test (in our case, this took place in May 2014). Also, it will be possible to re-use all the e-tests in following years, which is an advantage.

2. Possibilities that this type of e-assignment offers for students and lecturers

An e-test designed using an ELE quiz can be structured in different ways, usually starting with an introductory page where the instructions for the e-test are given, and then 2 or 3 pages with the tasks that the student has to complete. It can be displayed in different colours and fonts, can include images and links to URLs, audio or video files (Figure 1). It can be set to allow the student a single attempt or multiple attempts to complete the e-test, to have all the time he/she requires to complete it or, instead, to set a limit (i.e. 1 hour). When this is the case, students can have a timer displayed onscreen that reminds them how much time they have left. They can also see the maximum number of points they can be awarded for each question (Figure 1). These elements help students to manage their exam time effectively.

A full description of the possibilities can be found on the Moodle website.

Figure 1. Images and audio file added to the quiz. The timer is in the top right corner.
a) Varieties of question types that students can be asked to complete

Quizzes allow lecturers to use a wide range of question types, such as multiple choice, true-false, short answer, long answer (essay), embedded answers, drag and drop, organise, match or numerical, amongst others (Figures 2 – 5) in order to design effective questions to test students’ skills and knowledge. These can include images, links to URLs, audio and video files, and are kept in a question bank, which can be useful when designing new quizzes. Students can pause and replay videos and audio files.

Figure 2. Different types of multiple choice question types.
**Figure 3.** Multiple choice and embedded answer question types.

**Figure 4.** Drag and drop question type.
Figure 5. Video and essay answer question type.

b) Forms of marking and feedback that the students can receive

For all of the above-mentioned question types, except the essay, answers provided by students can be marked automatically by the system. This is possibly one of the main advantages for lecturers, as it means they can be relieved from marking hundreds of assignments, therefore saving time and effort. To achieve effective marking and feedback it is necessary that the lecturer who builds the quiz indicates to the system, very accurately, the specific amount of points that each question is going to be worth. This will allow the system to do the maths. Essay questions can obviously only be marked by lecturers and they can do so by accessing every student’s e-test once they have submitted it and adding the mark followed by written feedback.

Feedback provision is optional. The system can be set to provide automatic feedback after each question is answered or at the end of the test. This feedback can be a set sentence provided by the lecturer when building the quiz or a response with the right/wrong answers.

The maximum mark for the whole test can be chosen by the test designer (i.e. 100, 80, 75, etc.).

c) Ways in which lecturers can visualise students’ answers and results

This is one of the most interesting applications of ELE quizzes. As soon as the student starts completing the e-test, the system starts providing information to the lecturer on how this student is performing when answering the questions. Once the student has completed his/her assignment, the
results are displayed in a chart showing the following information: Name / Surname / State / Started on / Completed / Time taken / Grade / Q1 / Q2 / Q3 / Q4 / Q5 (Figure 6).7

‘State’ refers to whether the student is still completing the e-test or if he/she has finished it. For every question, the table tells the amount of points the student achieved out of the maximum amount of points for the question. This way, a list of all the students who attempted to complete the test is available to the lecturer. At the bottom of the list, the average grade for students is calculated, and also the overall average mark for each question (Figure 7). Finally, a graphic displaying the overall grade ranges can be viewed (Figure 8). This complete report is an excellent tool for lecturers, as it provides them with information about their students’ performance and progression and an overall average for the final grade and for every question that can be used to assess whether the design of the assessment was efficient or not. For example, in test 3 the grades achieved by students ranged between 35 and 95, where the vast majority of students achieved marks between 55 and 65 or 75 and 80, instead of predominantly high or low, showing a reliable variation in listening comprehension skills. The lowest marks (25-35) correspond to students who experienced technical problems in that e-test and did not retake it.

For privacy purposes, the names and surnames of students in the list have been covered.

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7 For privacy purposes, the names and surnames of students in the list have been covered.
**Figure 7.** Continuation of display of multiple data. Overall average at the bottom.

**Figure 8.** Graphic displaying the overall number of students achieving grade ranges.
3. Advantages and disadvantages of using these e-tests for lecturers and students

From my experience designing and implementing ELE quizzes for learning and assessment purposes, I would summarise the advantages and disadvantages of their use as follows:

<table>
<thead>
<tr>
<th>Advantages for Students</th>
<th>Advantages for Lecturers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Completing formative listening assignments from home, with their own headphones, at a convenient day and time within the time given (1 week) and completing their answers within ELE.</td>
<td>Taking pressure off by minimising the time spent on marking and writing feedback, as this method provides automatic marking and automatic feedback for non-written answers.</td>
</tr>
<tr>
<td>Completing a range of questions, including multiple choice, true or false, matching, filling the gaps, organising and writing a longer answer, suiting different types of learners.</td>
<td>Marking the written answers is quick as it is completed within the same quiz.</td>
</tr>
<tr>
<td>Immediate mark and feedback when the e-test contains only quiz questions. With written questions, the mark and feedback can be available in a few days.</td>
<td>Assess students’ LC sub-skills using different questions.</td>
</tr>
</tbody>
</table>

<table>
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<tr>
<th>Difficulties</th>
<th>Difficulties for Lecturers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Occasional technical problems due to internet connection or ELE failure.</td>
<td>It takes time to learn how to design an ELE assignment, how to make it visible for the students, how to mark it and also to continue researching new ways of e-assessment.</td>
</tr>
<tr>
<td>Initial lack of experience on how to approach this type of e-test may lead them to run out of time.</td>
<td>It needs the availability of an Educational IT specialist to revise the assignments before they are visible to students and to help lecturers in solving any possible technical problems.</td>
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</table>
Considerations when designing and monitoring formative/summative ELE quizzes

After having seen the performance and results achieved by students in the three different e-tests, I realised that there are important points to be considered when designing quizzes and also when monitoring them. They will be different for each discipline but, to assess LC skills, these are my recommendations:

- Limit the amount of time that students have to complete the test (i.e. 50 minutes).
- Limit the number of attempts that students have to complete the test (i.e. one attempt).
- Define very well what it is that you want to assess and choose the types of questions accordingly.
- In addition to the multiple choice, true-false, match, organise, short or embedded answer types of question, use one which needs to be completed by writing to make the test more reliable, avoiding random answers.
- Use MP3 audio files if possible, instead of URLs or video files, especially during summative exams, as sometimes, if ELE is having technical problems, those files may run slowly or present technical problems for some students.
- Write short and direct instructions for students.
- Ask students for feedback during the week they are given to complete their e-test and check their results regularly to make sure that it is running smoothly.
- Ask them to complete a ‘Reflection form’ where they can reflect on their performance in the assessment and think of techniques they can use to improve.

Regarding the technical problems that some students may experience, there is a solution. After the student has submitted his/her attempt, this can be deleted, which gives the opportunity for the student to submit their answers again.

To avoid problems related to students’ initial lack of experience completing this type of e-test, lecturers should give them guidance in class before they start the test. For example, some students start answering the questions on the first page without realising that there are more questions on the next page; thus, they spend too much time on the first questions and run out of time to complete the later questions. Therefore, it is necessary to advise them that the e-test will have multiple pages and that they should have a look at all of them before starting it. This way they can manage their time better.

Regarding the need for lecturers to spend extra time researching and learning how to design and use quizzes, I understand that it can be a real burden in their daily busy routine. Therefore, I understand that not every lecturer will be willing to adopt this type of assessment as part of their modules. However, I think this could be an opportunity for collaborative work between lecturers, where those who have been using ELE quizzes could form a team of lecturers willing to provide advice and support in the design of quizzes to other lecturers. They could also offer some training on how to monitor the assessment process, how to access each student’s e-test and mark the written answers or provide feedback. This would benefit all lecturers, without taking too much of their time.
Conclusions

I would like to conclude this article by highlighting that, despite being initially a time consuming task, designing and implementing e-tests built on ELE quizzes has had many benefits for the MLS1001 Spanish Language module, its students and its lecturers. Although its use in other disciplines may be more or less advantageous – depending on the subject and the skills that have to be assessed – this form of assessment can always provide an additional source of formative work for students in any discipline. It provides them with individual, home based, 24/7 and ELE-integrated immediate access to questionnaires about any topic they have been learning in class, allowing them to consolidate their knowledge or skills, self-assess and reflect on their performance, and develop their self-study skills (which is something they request, according to MACE results).

From the lecturer’s perspective, having computerised marking of both formative and summative assignments for a full cohort means that they can feel relieved from this task and focus, for example, on the marking and feedback provision of other written assignments. Also, it means that for a summative exam, the full cohort can take the exam at once using the computer rooms available in campus.

I would invite every lecturer to explore the options that ELE quizzes can offer them and to request help from Academic Services in their use. In the meanwhile, this tutorial can give a good taster of how to start creating a quiz: https://www.youtube.com/watch?v=RNBs4Q-42QM.
Appendix

Discussion of the literature on the subject and how I applied it to the assignments I created

What I found in the literature was a variety of ideas on how to select the texts for a LC assignment, bearing in mind their characteristics (authenticity, type, relevance, language and genre) and the 10 criteria suggested by Wilson (in Martin 2010: 561), which are the following: interest, cultural accessibility, speech structures, density, linguistic level, length, quality of the recording, speed, number of speakers and their accent.

Also, information on how to create the tasks and questions to assess the students’ understanding of the audio text (Martín 2010, Pastor 2009 and Bravo et al.), based on a list of sub-skills related to the general LC skill, that should be evaluated (Rodríguez and Bravo et al.), like understanding the direct meaning of the text, understanding the inferred meaning, understanding the microlinguistic aspects and note taking while listening.

Finally, I learned about how the results of the test should be marked (Maíz and Domínguez 2009), and the controversy about whether short answer tasks should accept (or not) answers which are partially correct, but not the answer that it was expected from students to give. Maíz gives examples of occasions when students used a different answer to the expected one, but that answer proved that they had understood the oral text. Therefore, they should be awarded a percentage of the mark for that question. I agree with this view, but when designing e-assignments on ELE it is complicated to implement. I will investigate the issue further.

While I was reading the literature, I also noticed that there is a disparity of opinions from the different authors in some other aspects, like what is considered to be an authentic text and what is not. Some authors believe that it is only real sources, obtained from public statements, speeches that appear in the media, public presentations and spontaneous conversations, what can be considered authentic texts (Bravo et al.), whereas there are others, like Martín (Martín 2010 and Pastor 2009), who consider that, as long as the interaction between the speakers and the student, as a listener, is the same as in a real situation, texts that are not real can be valid for a LC assignment too. These texts do not come from real sources, but from a controlled source where the lecturers or other language professionals, having previously prepared the dialogues (adapting the natural speed of the speakers, their accents, the linguistic level and other factors to the students’ level) hold the conversations. Regarding this aspect, my view is that in the first stages of the language of study (levels A1 and A2 of the MCER, and even in level B1) this type of texts can be valid, but for higher levels (B2-C2), only conversations that come from a real source should be valid, as the sub-skills that students need to develop in order to understand those texts and more demanding than for the prepared texts.

Another aspect is whether an online assessment based on a questionnaire with only true or false, multiple choice, fill in the gaps, match or short answer tasks, and not long answers task is valid to assess students’ LC skills. My view on that aspect is that, given the chances of a number of students ticking the correct answer by fluke, but not because they really know the answer, I would include a task where students have to answer a question about the text they just heard using their own long sentences. This answer would give us a 100% genuine reply, which would also let us assess the students’ ability to take notes while listening.
The result of my research and application of the ideas I learned in the literature is a collection of 3 new formative LC assignments on ELE, which have a similar format and cover a variety of topics in a variety of texts, tasks and questions. In addition to the assignments, there is also a reflective form for students to fill in after they have completed every formative e-test, which aim is to encourage them to reflect on their performance, techniques and ways of improvement. I believe, like Kohonen (1999), that the lecturer has to invite his/her students to reflect on their own learning, asking them questions that will lead them to critical awareness of their own learning and to action. It is the main student who has to be in control of his/her own learning, and this reflection can help them to achieve that.
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