

ECP 2007 EDU 417008

ASPECT

Final Report on the Experimentation

Deliverable number D6.5

Dissemination level Public

April 2011 **Delivery date**

Final **Status**

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eContentplus

This project is funded under the eContentplus programme¹, a multiannual Community programme to make digital content in Europe more accessible, usable and exploitable.

¹ OJ L 79, 24.3.2005, p. 1.



Summary

During the ASPECT project, a series of experiments were organized with teachers from four countries to solicit their opinions as end-users of content packaging, search features and mechanisms developed in the ASPECT project. Four advanced teachers (considered focus group teachers) from Belgium (Flanders), Lithuania, Portugal and Romania and ten/eleven teachers with lower levels of ICT competence from each of the same countries were selected and three workshops were organized. Teachers' responses were elicited to better understand whether and to what extent standards and specifications enhance user experiences in cross-border discovery, exchange, use and repurposing of learning resources. This deliverable describes the experiments carried out and presents materials used to elicit user feedback. The data gathered from these experiments are presented in the "National Validation Reports" (deliverable D6.4), whereas the conclusion drawn from this work is presented in a dedicated section of the "Final Evaluation Report" (deliverable D7.3.2).



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1 Introduction

The objective of ASPECT's work package 6 - Organisation and Management of User Feedback (School Pilots), was to organise a series of experiments with teachers from four countries to solicit their opinions as end-users of content packaging, search features and mechanisms developed in the ASPECT project. In order to achieve these goals, four advanced teachers (considered focus group teachers) from Belgium (Flanders), Lithuania, Portugal and Romania and ten/eleven teachers with lower levels of ICT competence from each of the same countries were selected and three workshops were organized. Teachers' responses were elicited to better understand whether and to what extent standards and specifications enhance user experiences in cross-border discovery, exchange, use and repurposing of learning resources. This deliverable describes the experiments carried out and presents methods and instruments used to elicit user feedback. The results of these experiments for each national group of teachers are presented in deliverable D6.4.

The tests were spread out during the months of October 2009 to May 2010, and took place in three independent workshops:

- Workshops 1: National workshops
- Workshops 2: Online workshops
- Workshop 3: International workshop for all participants

These workshops varied in formats. Data for evaluation was gathered using three methods appropriate for a pilot project with a relatively small, preselected group of participants.

- 1. Online Surveys after each task
- 2. Interviews with the teachers
- 3. Observation

The remainder of this deliverable is organized in 4 sections. Each of the three workshops is described in a separate section (Section 2 to 4), whereas the experiment instruments/materials used during these workshops are presented in Section 5.



2 Workshop 1

The first workshop consisted of four national workshops organized in October 2009 to observe and evaluate teachers' online behaviours when searching for learning resources using the ASPECT Learning Resource Exchange portal. The four workshops took place over consecutive Saturdays in each of the countries:

- Ghent (Belgium), Sat 3 Oct 2009
- Lisbon (Portugal), Sat 10 Oct 2009
- Vilnius (Lithuania), Sat 24 Oct 2009
- Bucharest (Romania), Sat 31 Oct 2009

All materials were translated from English into the four national languages (Dutch, Portuguese, Lithuanian and Romanian). The same sequence of activities (tests, etc.) was implemented during the course of the four national workshops.

9:00	9:15	Welcome	
9:15 9:30	9:30 10:00	Introduction to ASPECT Introduction to the tests	
9.30	10.00	introduction to the tests	
10:15	10:30	Questionnaire 1	15 m
10:30	12:30	Test 1 - Lesson plan	2 h
14:00	14:15	Questionnaire 2	15 m
14:15	16:00	Test 2 — Exercises	1h 45 m
16:30	17:00	Questionnaire 3	15 m
17:00	18:00	Discussion of experiences	1 h

To ensure that the same process was consistently applied, Àgueda Gras-Velázquez, the WP6 leader from EUN, attended all four workshops.

The first workshop consisted of three questionnaires and two tests. The questionnaires could be accessed only during the day of the workshops at: http://workshops.aspect-project.net (see Figure 1 for a screenshot of the page on the day of the workshop in Vilnius). Although the landing page was in English, the tests and the questionnaires themselves where in the national languages.



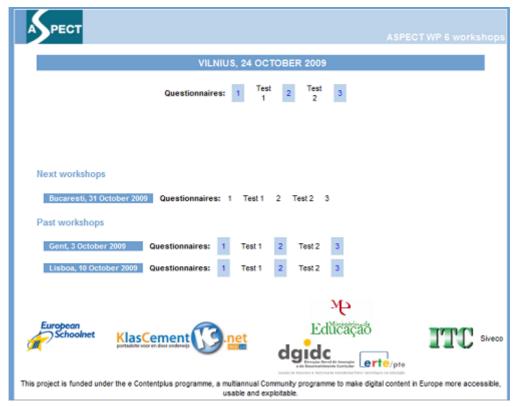


Figure 1: Workshops page on the day of the workshop in Vilnius. Buttons 1, 2 and 3 linked with the questionnaires in the national languages.

2.1 Questionnaire 1

The first questionnaire was designed to collect background information on the teachers and asked teachers to indicate the following:

- Subject (Physics, Chemistry, Maths...)
- ICT knowledge
- ICT access (Internet access at home/school, Own PC/shared, school has a PC per student/beamer in class)
- Teacher's usual preparation effort (prepare lesson plans every year vs never)

Additional information on the teachers was obtained by asking both at the beginning of the workshop and then at a later time whether:

- They had used the LRE portal before / in the last few months (if yes, how often)
- They had used Google to search for content for their classes (and how often)
- They had used any other portal. If yes, which one and how often (on average once per day / week / month...)

The complete questionnaire 1 in English can be found in Section 5.1.

2.2 Test 1 - Lesson plan

In 2 hours, teachers had to draft a lesson plan on any topic which could be used in a Science or Mathematics class following a simple guide. This lesson plan had to include:

- one image
- one simulation
- one interactive simulation



• one animation to be used as an activity/exercise by the students

Seven of the teachers were asked to use resources found only through the ASPECT version of the LRE portal. Three of them were asked to use resources found only through Google.

Before the workshop, "focus group" teachers were asked to create a lesson plan in their language using the ASPECT LRE portal in a two-hour timeframe. This lesson plan included four animations from the ASPECT LRE, appropriate to the topic. The lesson plans were distributed among the teachers of the workshops as examples.

2.3 Questionnaire 2

The second questionnaire was intended to gather data on how teachers approached searches for learning resources and whether their behaviors differed significantly using a popular but generic search engine (Google) versus the ASPECT LRE portal that had been tailored to provide services for educators with search features utilizing educational metadata standards.

The complete questionnaire 2 can be found in Section 5.3 in English, while the translations into the national languages can be found in D-6.4.

2.4 Test 2 - Exercises

The exercises consisted on finding six resources following a set of characteristics (15 minutes per exercise). These characteristics were taken from the lesson plans of the focus teachers.

Process:

- 1. Each of the four focus group teachers created a lesson plan with four resources in their language.
- 2. These lesson plans were used as an example in their corresponding national workshop.
- 3. One resource from each lesson plan helped define the sorts of resources the teachers at the workshops would have to find.

Teachers during the workshop were asked to find three resources that had previously been identified and described with a set of characteristics (language, subject, learning resource type) using the ASPECT LRE and three with the same set of characteristics using Google. To find each resource, the teachers had 15 minutes.

Teachers in different countries were asked to find the same resources and were not permitted to look for a resource they already knew. To ensure that teachers did not search for something familiar, the project instituted a set of controls decided upon by the national group. For example, Lithuanian teachers were asked to find three resources, both in the ASPECT LRE and Google; each of these resources had previously been used in a lesson plan by focus group teachers from Romania, Belgium and Portugal. In turn, Romanian teachers were asked to look for resources identified by focus group teachers from the other three countries.



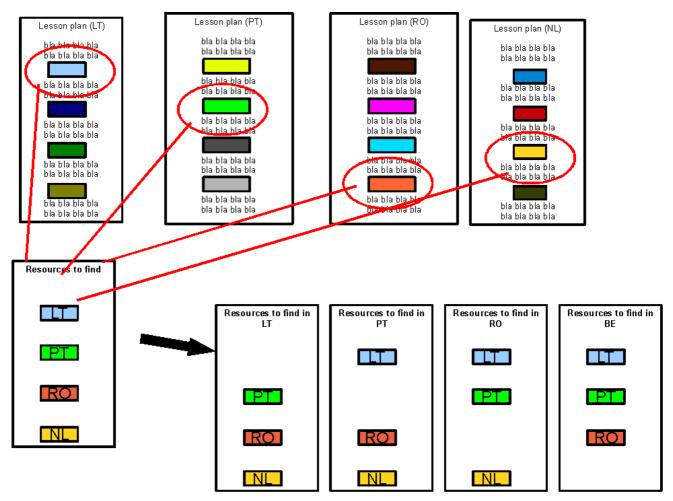


Figure 2: Resources used in the exercises for the teachers of each country.

The example provided was

Using the ASPECT LRE: Look for one resource with the following set of characteristics:

Kangaroo animation for 10 year-old children, language, subject, learning resource type...

Teachers were asked to take note of each step they took to find the resource that most resembled the one described. An example description was:

- 1. Searched for "kangaroo animation"
- 2. Looked at 10 of the 386 links obtained
- 3. Dismissed because they were all green kangaroos
- 4. Added "natural coloured" to the search keywords
- 5. Looked at 3 of the 120 links obtained
- 6. Dismissed 2 of the links because they had a copyright that did not allow downloading
- 7. Chose the third link <u>URL:http://....</u> Because it fulfilled 4 of the 5 requirements.

The type of data WP6 was looking for was" the time it took teachers to find each resource; whether it became easier to use the ASPECT LRE after a certain point; if looking for a resource first in the ASPECT LRE or with Google had an effect on their speed, etc.



The complete descriptions and whether teachers had to use the ASPECT LRE or Google can be found in Section 5.4 in English. The exercises were called BEn, PTn, LTn and ROn, where the country code referenced the original lesson plan the resource came from and the n was either 1 or 2, just to indicate the order in which the resource had to be found. For example BE1 corresponded to a resource which had been found by the Belgian focus teacher and used in his lesson plan and that the teachers from Lithuania, Portugal and Romania had to find in the ASPECT LRE, while BE2 was the same resource which had to be found using Google.

To make sure that the neither the ASPECT LRE nor Google was used always first, WP6 alternated the order for each set of resources. For example RO1 corresponded to a resource which had been found by the Romanian focus group teacher and used in her lesson plan and that the teachers from Lithuania, Portugal and Belgium had to find using Google, while RO2 was the same resource which had to be found in the ASPECT LRE.

2.5 Questionnaire 3

The third questionnaire had two parts. The first part consisted of questions to complement the data from the 2nd test. The 2nd part consisted of questions asking teachers to evaluate the workshop to be used in the evaluation of the project by Work package 7.

The questions on the second test included the time taken to find the resource and the evaluation of found resources:

- What did you think of the resources found (e.g., I am not convinced it is for the right age. I like it, etc.)
- What search strategy did you use to find the resource? (e.g., Keywords)
- When looking for the resources, did you... (e.g., Find many resources in appropriate language, Repeated links, etc.)

The complete questionnaire 3 in English, excluding the questions on the workshop itself, which were items for work package 7, can be found in the Annex.

2.6 Discussion of the experience

The national workshops concluded with a group discussion to explore open questions and complement tests and questionnaires. Workshop organizers recorded the answers provided by teachers. Questions asked during this session included:

- 1. Think about reasons to use resources that can be found in the web to enhance your lessons.
- 2. What kind of problems did you face when searching for the resources?
- 3. Do you need extra time to prepare your lessons if you are using the ASPECT LRE to do it?
- 4. Why would you choose to use the ASPECT LRE in your daily lesson plan making process?
- 5. How could the ASPECT LRE be easier to use? How would it ideally work in your mind?
- 6. You are about to produce new materials using the web. Explain in detail the process how you search and edit materials for it.



- 7. Explain in detail how you previously used resources found online before in your teaching.
- 8. What requirements must web resources have in order for you to use them in your classroom?
- 9. What kind of conditions would you like to put on someone else using your materials?
- 10. Imagine a situation where you have searched for material for your teaching and you have included/adapted it into your teaching materials. When do you think (at which point) it becomes your own?
- 11. What would make you use materials produced in other countries or cultures?
- 12. Did using the ASPECT LRE portal meet expectations you had at the start?
- 13. Describe the circumstance when you would consider using ASPECT LRE in the future?
- 14. What kind of ideas did this workshop raise in your mind?

3 Workshop 2

Workshop 2 consisted of an online workshop, organized in March 2010, focused on Discovery, Reusability and the Moodle Learning Management System.

WP6 carried out tests to analyze teachers' search behaviours. Tests were also conducted to solicit teacher opinions regarding learning resource reusability and sharing of resources, i.e., under what kinds of conditions would teachers trust or share resources, in particular when it comes to tags, ratings, authors (content providers), etc.. Finally, WP6 wanted to determine teachers' knowledge of the Learning Management System, Moodle, in preparation for the third workshop.

To carry out this workshop online, teachers were asked to access again http://workshops.aspect-project.net/. A screenshot of the access page at the time of the second workshop can be seen in Figure 3.



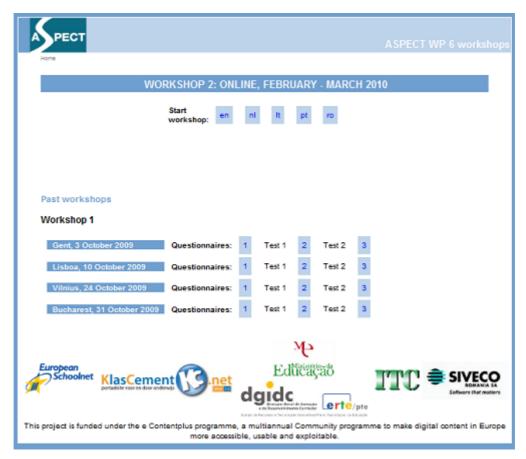


Figure 3: Screenshot of the landing page of the second workshop from where teachers could access the test in their national languages.

The tests and questions of the second workshop can be found in English in the Annex. Additionally, in figures 4 and 5 we show two screenshots of how WP6 displayed the tests and questions of this workshop using Google forms.



Figure 4: Screenshot of questionnaire of the second Figure 5: Screenshot of task of the second workshop workshop using Google forms.



using Google forms.



4 Workshop 3

The third session, organised in May 2010 in Lisbon, brought all the teachers together and concentrated on the integration of resources into Learning Management Systems (LMS) and content packaging, in particular exploring how packaged content (such as SCORM and IMS Common Cartridge) can be exploited by teachers and whether teachers think these packages can add value to their students' learning experiences. The LMS used was Moodle. For those teachers who had no previous experience with Moodle, WP6 carried out a basic Moodle training session to makes sure all participants were on an even competence level with this system during the third workshop.

The workshop was built up around three main tests, each of them followed by two types of feedback methods involving questionnaires and open discussions. All three tests were designed to serve both as basic training on the use of different types of packaged content and their features (necessary given that teachers had no previous experience with this kind of content) and, at the same time, provided an opportunity to obtain teachers' opinions on the usefulness and ease of use of content packages for their everyday teaching.

4.1 Test 1

A key part of the Lisbon workshop focused on how ASPECT teachers understood and were able to work with different packaged content in Moodle. WP6 also set up tests to collect teachers' opinions on content packaging independent of any particular LMS. The objective of test 1 was to obtain feedback on how teachers would react to various types of packaged content.

For the test WP6 used a resource on Thermodynamics from the University of Ljubljana. The resource was available in three different formats: as a non-packaged resource, as a SCORM package, and as a Common Cartridge package from the ASPECT LRE (see Figure 6).



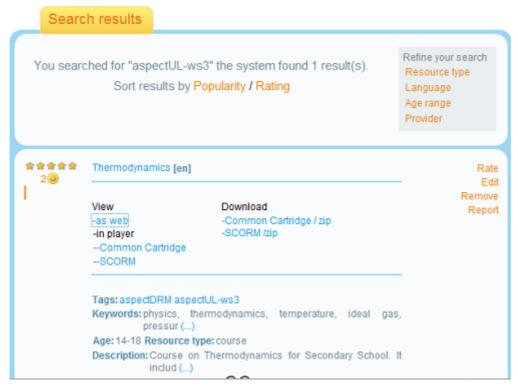


Figure 6: Thermodynamics resource in the ASPECT LRE, available as web page (what we refer to as non-packaged), and in Common Cartridge and SCORM packaged (both to play or download).

In the test the teachers were first asked to create a normal lesson plan using the Moodle LMS in a "traditional" way by combining different resources. Then they were asked to repeat the same task using a resource on the same topic that had been 'packaged' by ASPECT content developers using both SCORM and IMS Common Cartridge.

In Figure 7 we show the original resource in the website where it is hosted. The task was to create a simple lesson plan within Moodle made up of some text, an image, a quiz and a forum, on the topic of thermodynamics, using four different approaches:

- 1. Using non-packaged content (see the Thermodynamics resource in Moodle in Figure 8, uploaded from the website).
- 2. Using the entire SCORM package, created from the non-packaged content (see in Figure 9 the SCORM packaged resource inserted in Moodle).
- 3. Using an entire IMS Common Cartridge package, created from the non-packaged content, with a forum added (see Figure 10 for the Common Cartridge packaged resource in Moodle).





Figure 7: Website with the Thermodynamics lesson used as a resource for the ASPECT tests.



Figure 9: Same Thermodynamics resource, SCORM packaged appears in Moodle as a single entity.

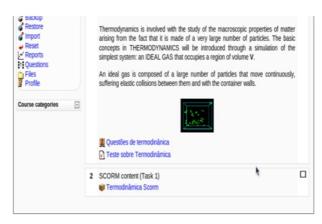


Figure 8: Non-packaged content: Thermodynamics lesson in the Moodle platform, inserted in pieces (text, images and simulations independently).

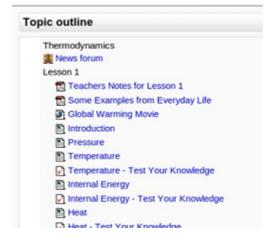
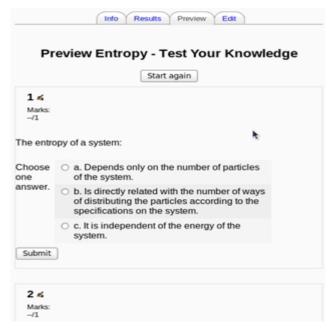
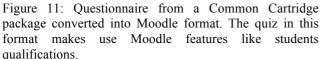


Figure 10: Same Thermodynamics resource, Common Cartridge packaged appears in Moodle split into its components.

Additionally, teachers were asked to recreate the lesson plan a fourth time using selected parts from the IMS Common Cartridge package. To do this, WP6 taught them how to embed parts of a Common Cartridge package into Moodle. At the end of this fourth part of the first test, teachers could compare the same quiz from the resource both uploaded into Moodle and embedded (see Figures 11 and 12).







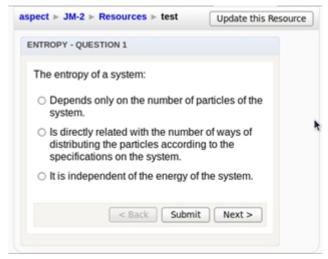


Figure 12: Questionnaire from a Common Cartridge package embedded into Moodle. The questionnaire can be used independently from the rest of the package but it does not make use of Moodle features.

The instructions to carry out Test 1 and the corresponding questionnaire can be found in Sections 5.7 and 5.8, respectively, in English.

4.2 Test 2

The third workshop also addressed the issue of Access Control mechanisms such as digital credits, i.e., the possibility for teachers to gain credits by rating and uploading materials and then using their credits to download other resources.

The primary objective of test 2 was to obtain teacher reactions to Access Control requiring digital credits. In preparation, WP6 had previously tagged a set of resources and applied access control mechanisms to this set requiring the use of credits in order for them to be browsed by the teachers.

The teachers were asked to go through a number of resources about half of which required the use of credits. Teachers browsed freely through the resources until their credits ran out. Afterwards they were asked to comment on the experience.

The instructions in English to carry out the second test of this workshop and the corresponding questionnaire can be found in Sections 5.9 and 5.10, respectively.

4.3 Test 3

The primary objective of test three was to elicit teacher feedback as they explored the functionalities and usability of packaged content in two different packaging formats.

The teachers reviewed a number of packages, some in SCORM and some in IMS Common Cartridge format. This task focused on the features of the packages themselves independent of how they worked in any particular Learning Management System.

The detailed instructions in English to carry out this third Test can be found in Section 5.11 and the corresponding full questionnaire in Section 5.12.



5 Experiment Materials and Activities

5.1 Workshop 1 – Questionnaire 1: Basic information

1. Name:						
2. Gender:	() Female () Ma	ale			
3. Age						
()	19-30					
()	31-40					
()	40-55					
()	> 55					
4. How ma	any years hav	e yo	u been a teacher?			
()	<5					
()	5-10					
()	10-20					
()	> 20					
5. Level o	f studies:					
()	Teachers deg	ree (specialized in Sci	ence)		
()	Physics degre	ee				
()	Chemistry de	gree				
()	Maths degree	;				
()	Biology degr	ee				
()	Geology degr	ree				
()	IT degree					
()	Something el	se, w	what			
6. What su	ibjects do you	ı tead	eh?			
()	Physics					
()	Chemistry					
()	Maths					
()	Biology					
()	Geology					
()	IT					
()	Something el	se, w	vhat			
7. Mother	tongue (Mark	all 1	the appropriate)			
	Dutch		Romanian		Other (which)	
	Portuguese		Lithuanian			



8. What other languages do you know? What are your language skills?

	A - Basic User		C - Proficient
		User	User
English			
French			
German			
Russian			
Spanish			
Other:			

Spanish							
Other:							
9 How much time do y	you spend using a comp	iter on an average day?					
[] Less than 30		ator on an average day:					
	minutes and 1 hour						
[] Between 1 a							
Between 2 a							
[] More than 4							
	d and would you like to l	earn ahout:					
10. Have you ever used	I do not know and I	I have not used	I have used it/them				
	am not interested	it/them but would	already				
		like to know more					
Windows PC							
Linux operating system							
Mac computers							
11 111:1 0:1: 1	1 41 97 1	1: 11 \					
-	ou have at home? (mark	as many as applicable)					
	shared with others						
[] your own co	-						
2 3 6	nsole (PS2, Wii)						
[] Internet acc							
[] wireless Into							
	rnet (in cell phone or sim	,					
12. Your school has: (r	mark as many as applical	ble)					
[] Internet							
[] 1 computer	[] 1 computer to be shared among all the teachers						

[] A computer for every teacher



[] A com	puter lab for th	e stude	nts							
[] A computer for each student										
[] A beamer (projector)/PC in each class										
[] A digit	[] A digital whiteboard in some classes									
[] A digit	tal whiteboard	in ever	y class							
13. How often do	you prepare te	aching	materia	ls us	sing?					
		Never	Annua	ılly	Month	ly	Weekly	Daily		
Во	ooks									
Le	esson plans									
Co	omputers									
W	eb materials									
14. How often do	you use with w	our stu	dents	?						
Ti. How often do	you use with y	our sta	dents							
		Never	Annua	ılly	Month	ly	Weekly	Daily		
Во	ooks									
Le	esson plans									
Co	omputers									
W	eb materials									
					L					
15. How often do	you (either for	classes	s or in y	our	free tim	e)?				
		nev	er	les	s than	be	etween	a few		almost
					ce a onth		nce a eek and	times a		every day
				1110	11111		nce a	week		
						m	onth			
Use Microsoft excel, powerpoint	Office (word	d,								
Use OpenOffice impress)	(write, cale	c,								
Use Email									+	
Use chat rooms, s	skype									
Use Learning (Moodle, WebCT,	environmen , Optima)	ts								
Visit social network Facebook, mystonline discussion	Space) and/o	_								



Use search engines (eg Google) and/or online reference sources (eg Wikipedia)			
Use (participate) in a blog, wiki, forum			
Use schools evaluation and administration system (Primus, Pallas pro etc.)			
Play online games with other people (e.g., World Of Warcraft, Second life)			
Download software programs and/or music or films			
Write computer programs and/or build websites (html, Dreamweaver, Frontpage)			

16. What sort of materials have you used in your teaching / would you like to use in your teaching?

	I have used them	I would like to use them
Texts		
Pictures		
Videos		
Simulations		
Tests		
Tasks, assignments		
Presentations (e.g., with Powerpoint/Impress)		
Lesson plans		
Maps		

17. How much have you...?

	Not at all	Little	Some	A lot
Used materials found on the web				
Edited materials you found in the web				
Made new materials for your teaching from scratch				
Shared your new materials with your colleagues				
Given feedback on other people's materials				

18. If you have never used web materials before, why not? (mark as many as you wish)



	[] I fear my rights are not protected
	[] I don't get support from management
	[] I don't have time to search or edit materials
	[] I don't know how to add them in my teaching
	[] They didn't fit my didactics view
	[] I can't be in contact with the owner
	[] I rather produce my own materials
	[] I don't find it beneficial to share materials with others
	[] I don't know how to find them
	[] Something else, what
19. I	Oo you know and have you ever used the LREforschools portal?
	[] I don't know it
	[] I know it, and I have used it a couple of times
	[] I know it and I use it one a month
	[] I know it and I use it one a week
	[] I know it and I use it almost every day
20. I	Do you use Google to search for material for your lessons?
	[] No
	[] I have used it a couple of times
	[] Yes, I use it one a month
	[] Yes, I use it one a week
	[] Yes, I use it almost every day
21. I	Do you use any other portal to search for material for your lessons?
	[] No
	[] Yes, I use
22. F	How often do you use it?
	[] I have used it a couple of times
	[] Yes, I use it one a month
	[] Yes, I use it one a week
	[] Yes, I use it almost every day
	What sort of function do you think would help you use web materials more often? (mark any as you wish)
	[] Efficient search tool
	[] Keyword index



[Other teachers' evaluation and reviews/comments on the materials
[] User rating (for example «-««« stars)
[] Translation to my own language
[] Good visual appearance
[] Easy to use
[] Adaptability
[] Reliability (well known) of the author
[] Clearly stated level (beginner, progressed, expert)
[] Examples of how to use material in teaching
[] Something else, what
24. Have	you ever co-operated, when creating web materials, (mark as many as you wish)
[] With a colleague at the same school
[] With a colleague in the same geographical area
[] With a colleague elsewhere in my country
[] With a colleague outside my country
[] None of the above
[] No, but I am willing to it in the future
[] Something else, what
25. Whos	se materials could you think of using? (mark as many as you wish)
[] Materials of your colleagues at the same school
[] Materials of colleagues from the same geographical area
[] Materials of colleagues from elsewhere in my country
[] Materials of colleagues from outside my country
[] Something else, whose
26. Who	would you give your own web material to? (mark as many as you wish)
[] a colleague from the same school
[] a colleague from the same geographical area
[] a colleague from elsewhere in my country
[] a colleague from outside my country
[] None of the above
[] Something else, whose
	sort of problems do you think you would face if you used materials produced in countries or cultures? (mark as many as you wish)
[] Materials do not fit to my curriculum
Г] The subjects vary between the countries



[] The roles of pupils and teachers are very different	
[] The didactics are different (e.g., styles, group work)	
[] Communication is too different	
[] Interfaces / appearances are too different	
[] Copyright difficulties	
[] Something else, what	
28. What sort of problems do you think appear in co-operation betwee different countries (when sharing materials and using them)? (mark as many a	
[] I don't know how to do it in English	
[] It takes too much time	
[] Editing is too hard	
[] I'd rather use material done in my country	
[] I don't know where to find international material	
[] I can't give support/help to someone using my materials	
[] I can't be sure of the quality	
[] I don't know who uses and how my materials	
[] I can't meet my colleagues personally	
[] Something else, what	
29. Which quality approaches are you familiar with? (please mark with an X =	= yes)
[] Quality Management (ISO 9000, EFQM)	
[] Accreditation (of University programs)	
[] Evaluation (of courses /programs)	
[] Benchmarking	
[] Rankings (for example giving stars)	
[] Peer reviewing	
[] Quality Marks (quality assessment by independent organization)	
[] Quality Checklist or Quality Criteria	
[] User recommendations (recommendations from colleagues or friend	ds)
30. Quality of resources for me means(On a scale of 1 to, 5) (1=Strongly agree)	y Disagree, 5= I
[] are scientifically correct	
[] fit my lessons / curriculum	
[] have a good use of multi-media (animations, simulations)	
[] can be integrated in my Learning Management Systems / my web	page
[] come from an organization with a good reputation (e.g., CERN, H	arvard, NASA)
[] have a clear impact for learners	



31. I find resources (yes / no)
[] by searching using keywords
[] by browsing by topic / subject / age
[] by recommendations from people who work in my area (e.g., fellow physics teachers)
[] by recommendations from friends who I know personally
[] which have received a good ranking
[] come from an organization with a good reputation (e.g., CERN, Harvard, NASA)
32. I trust resources? (yes / no)
[] only if I have reviewed them myself
[] if the resource is in my own language
[] if I've seen a preview of the resource (screen cap, picture)
[] have been reviewed by colleagues / scientists in the field
[] which have been used very often
[] which have received good rankings
[] from an organization with a good reputation (e.g., CERN, Harvard, N)
[] from an organization which has a Quality Certificate (e.g., ISO 9000)
[] can be integrated in my Learning Management Systems / my web page
[] if the resource has a full metadata attached to it
33. In which ways would you like to contribute for assuring the quality of resources (Mark as many as you like)
[] I would like to have my organization be certified (Quality Management, Quality Mark)
[] I would briefly comment on resources
[] I would rank resources (by giving «-««« stars)
[] I would review resources according to quality guidelines
[] I would like to be an accredited reviewer
[] I would not like to contribute to the Quality assurance process
34. Which could be the problems for contributing (if any)
[] I don't know enough about quality of resources
[] I don't have time to contribute
[] I don't think that quality can be assured in the internet
[] I have my own quality strategy
[] Quality depends on the situation of use, I cannot do that generally

Name: Joanot Martorell



5.2 Workshop 1 – Example of lesson plan structure

Subject: Astronomy: Kepler's laws:
Duration: 1-hour
Students: 16-18 years old
In astronomy, Kepler's three laws of planetary motion are:
1. "The orbit of every planet is an ellipse with the sun at a focus."
2. "A line joining a planet and the sun sweeps out equal areas during equal intervals of time."
3. "The square of the orbital period of a planet is directly proportional to the cube of the semi-major axis of its orbit."
blah blah []
Image showing Kepler's 1st Law:
Image from LRE: http://
Simulation of Kepler's 2nd Law
Simulation from LRE: http://
Example of Kepler's 3rd Law:
Interactive animation from LRE: http://
Activity: check the animation and fill in the correct answers
Simulation from LRE: http://



5.3 Workshop 1 – Questionnaire 2: Basic information

1. Name:
2. Repository used:
[] ASPECT LRE
[] Google
3. Subject of the Lesson plan:
[] Physics
[] Chemistry
[] Maths
[] Biology
[] Informatics
4. Title of the Lesson plan:
5. Time used to create the lesson plan if less than 2 hours:
6. Resources found and opinion of the resources: (Mark all the appropriate)

	1	2	3	4	5
Did you find one for your lesson	Image	Simulation	Interactive	Activity/test	
plan?			animation	animation	
No					
because there were none on this					
topic					
because the ones I found were					
not for the right age					
because the ones I found were					
not in the correct language					
because					
Yes					
But I am not convinced it is for the					
right age					
But I am not convinced it fits the					
topic completely					
But I am not convinced that I can					
use it without the permission of					
whoever made it.					
But I am not convinced it is very					
good					
And I like the animation					
And I think it fits the lesson quite					
well					

7. How did you find the resource? (Mark all the appropriate)



	1	2	3	4	5
	Image	Simulation	Interactive animation	Activity / test animation	
Searched via keywords					
Searched via subject					
Searched via target group					
Recommended by others					
Tagged by other users					
Same Content provider as another resource used					
Added to the favourites of another user					

8. Did you:

	Not at all	Not much	Yes	Definitely yes
Find the advanced search useful				
Find the descriptions of applets useful				
Find many LRs that interest you				
Find LRs in different languages				
Find many resources in appropriate language				
Find the rating system an easy way to find good quality LRs				
Find it a website which you will use in the future				
Like the direct link to subjects				
Think the portal is well organized				

9. Did you find:

	Not at all	Not much	Yes	Definitely
				yes
Many resources not relevant to the topic				
Repeated links				
Missing images				
Badly classified resources				
Badly organized resources				
Repeated (bits of the same web)				
A lot of content not for relevant age				



No content in relevant language		
The search engine results were not relevant		
Many broken links		

10. After Searching for a term, or choosing a category/type of resources, you obtained

	Not at all	A few of them were	Over half of them were	Almost all of them were
A relevant list of resources or links				
Correct language resources				
Correct type of resources ("animation" -> no images)				
Resources matching descriptions				



5.4 Workshop 1 – Description of resources to be found

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Resource BE1:

Using the ASPECT LRE portal, look for a resource matching as close as possible the following characteristics:

- Java simulation
- Subject: Maths
- Shows the relationship between the angle of the radius of a circle and the cosine of that angle
- Text in English

Please take note of each step you take to find the resource that most resembles the one described. Last step should include the URL of the resource you have found or the reason why you think you have not found one if the 15 minutes are up. Add as many steps as required or that fit in the 15 minutes. Example: Step 1: selected age 12 - 16

Step	1:
Step	2:
Step	3:

Name:

Resource BE2:

Using Google look for a resource matching as close as possible the following characteristics:

- Java simulation
- Subject: Maths
- Shows the relationship between the angle of the radius of a circle and the cosine of that angle
- Text in English

required of that it in the 13 initiates. Example, step 1, searched for sava simulation
Step 1:
Step 2:
Step 3:



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Resource RO1:

Using Google look for a resource matching as close as possible the following characteristics:

- to test students' knowledge on European URL domains
- crossword

Please take note of each step you take to find the resource that most resembles the one described. Last step should include the URL of the resource you have found or the reason why you think you have not found one if the 15 minutes are up. Add as many steps as required or that fit in the 15 minutes. Example: Step 1: searched for Java simulation

Step 1:		
Step 1: Step 2: Step 3:		
Step 3:		

Name:

Resource RO2:

Using the ASPECT LRE portal look for a resource matching as close as possible the following characteristics:

- to test students' knowledge on European URL domains
- crossword

required or that fit in the 15 minutes. Example: Step 1: searched for Java simulation	
Step 1:	
Step 2:	
Step 3:	



Name:

Resource LT1:

Using the ASPECT LRE portal look for a resource matching as close as possible the following characteristics:

- online test for students aged 9-11 on "angles"
- language: own language preferable, if not English

Please take note of each step you take to find the resource that most resembles the one described. Last step should include the URL of the resource you have found or the reason why you think you have not found one if the 15 minutes are up. Add as many steps as required or that fit in the 15 minutes. Example: Step 1: searched for Java simulation

Step 1:			
Step 2:			
Step 3:			
•••			

Name:

Resource LT2:

Using Google look for a resource matching as close as possible the following characteristics:

- online test for students aged 9-11 on "angles"
- language: own language preferable, if not English

•		-	-		
Step 1:					
Step 2:					
Step 3:					



Name:

Resource PT1:

Using Google look for a resource matching as close as possible the following characteristics:

- resource including activities on the origin and structure of the universe
- language: regardless of language, it should be easy to figure out what the user has to do

Please take note of each step you take to find the resource that most resembles the one described. Last step should include the URL of the resource you have found or the reason why you think you have not found one if the 15 minutes are up. Add as many steps as required or that fit in the 15 minutes. Example: Step 1: searched for Java simulation

Name:

Resource PT2:

Using the ASPECT LRE portal look for a resource matching as close as possible the following characteristics:

- resource including activities on the origin and structure of the universe
- language: regardless of language, it should be easy to figure out what the user has to do

equired of that fit in the 13 minutes. Example, Step 1, searched for Java simulation
Step 1:
Step 2:
Step 3:



5.5 Workshop 1: Questionnaire 3 - Exercises

Name:

Please mark the appropriate rows for EACH resource found during the previous exercises

Resource	1	2	3	4	5	6
Repository used						
ASPECT LRE						
Google						
Time used to find the resource:						
0 – 5 minutes						
6 – 10 minutes						
11 – 15 minutes						
I did not find any resource which seemed to fit the characteristics provided						
What did you think of the resources found						
I am not convinced it is for the right age						
I am not convinced it fits the topic completely						
I am not convinced it is very good						
I like it						
Would use it in class, if I were teaching this subject						
What did you use to find the resource?						
Searched via keywords						
Searched via subject						
Searched via target group						
Recommended by others						
Tagged by other users						
Same content provider as another resource used						
It was added to the favourites of another user						
When looking for the resources, did you						
Find useful the descriptions of applets						
Find many Los						
Find LOs in different languages						
Find many resources in appropriate language						



Find the rating system an easy way to find good quality LOs			
Like the direct link to subjects			
The portal well organized			
Many resources not relevant to the topic			
Repeated links			
Missing images			
Badly classified resources			
Badly organized resources			
Repeated (bits of the same web)			
A lot of content not for relevant age			
No content in relevant language			
The search engine results were not relevant			
Many broken links			
A relevant list of resources or links			
Correct language resources			
Correct type of resources ("animation" -> no images)			
Resources matching descriptions			



5.6 Workshop 2: Tasks and questionnaires

Name:
Country:
[] Belgium
[] Lithuania
[] Portugal
[] Romania
How much time do you spend using a computer on an average day?
* Less than 30 minutes
* Between 30 minutes and 1 hour

- * Between 1 and 2 hours
- * Between 2 and 4 hours
- * More than 4 hours

From November 2009 to January 2010, how often have you:

	Never	Once	Once a month	Once a week	Almost every day
Used the ASPECT LRE portal to search for material for your lessons?					
Used Google to search for material for your lessons?					
Used the LREforschools portal to search for material for your lessons?					
[Only NL] Used KlasCement to search for material for your lessons?					
[Only RO] Used the SIVECO portal to search for material for your lessons?					
Used a different portal to the above to search for material for your lessons?					

1. ASPECT – Discovery

Step 1: Open a new browser tab or window and log into the ASPECT LRE portal.

Remember, the URL is: http://portal.aspect-project.net

Step 2: Do the following tasks.



Task Alpha

- 1. Go to the ASPECT LRE portal
- 2. Search for one resource on any Maths or Science topic from a content provider from your country (Belgium KlasCement, Portugal DGIDC, Romania Siveco or Lithuania ITC).
- 3. Copy and paste the Title of resource and URL in the fields below.

Title:

Your URL:

If you did not find the resource after 20 minutes trying, answer NO to the Title and URL questions before and tick the following box.

No resource found after 20 minutes searching.

Task Beta

- 1. Go to the ASPECT LRE portal again.
- 2. Search for 1 resource on any Maths or Science topic from any of the content providers not from your country (Belgium KlasCement, Portugal DGIDC, Romania Siveco or Lithuania ITC).
- 3. Copy and paste the Title of resource and URL in the fields below.

Title:

Your URL:

If you did not find the resource after 20 minutes trying, answer NO to the Title and URL questions before and tick the following box.

No resource found after 20 minutes searching.

2. ASPECT - Content Reusability

Task 1

- 1. Go to the ASPECT LRE portal again.
- 2. Navigate to Resources tagged with 'ASPECT TEST'.

You can do this by writing ASPECT_TEST to the Jump to Tag box on the left and clicking 'GO'.

- 3. Browse/Take a look at the resources that appear (don't click on anything yet).
- 4. Then answer the following questionnaire

Ouestionnaire 1

1 - I don't	2 - I	3 - This	4 - I	5 - I
have any	have	particular	have	strongly
trust in this	hardly	functionality	some	trust this
resource	any trust	does not	trust in	resource
	in this	effect my	the	
	resource	trust in the	resource	
		resource		
	have any trust in this	have any trust in this resource any trust in this in this	have any trust in this resource hardly any trust in this in this resource trust in this resource trust in the particular functionality does not effect my trust in the	have any trust in this resource any trust in this in this resource trust in the resource trust in the resource trust in the resource trust in the resource



Preview picture – The resource has a preview picture attached			
Keywords – The keywords suit the resource that I am looking for			
Tags – The tags suit the resource that I had in mind			
Age Range – The resource is suitable for my students			
Licence – The resource is available with a Creative Commons licence			
Language – The resource is available in my own language, or on a language that I speak			
Description – The resource description suits what I am looking for			

Task 2

- 1. Go back to the ASPECT LRE portal.
- 2. Browse / look at a few of the Resources tagged with 'ASPECT_TEST'.
- 3. Then answer the following questionnaire.

Questionnaire 2

How much would you trust a resource based on	1 - I don't have any trust on this resource	2 - I have hardly any trust on this resource	3 - This particular functionalit y does not effect on my trust in the resource	4 - I have some trust on the resource	5 - I strongly trust this resource
The actual resource – When I click on the actual resource, it straightaway looks like it's going to match what I was looking for.					

Task 3

- 1. Go back to the ASPECT LRE portal.
- 2. Now click 'Rate' on any resource you choose.
- 3. Also click on the 'stars' of the resources.



- 4. Try to understand how the rating mechanism of the resource works.
- 5. Click on one of the resources, see what you think of it and rate it.
- 6. After rating a few resources, fill in the following questionnaire.

Questionnaire 3

Select "yes" or "no":	Yes	No
I understand how the rating (stars) of resources work		
I think that rating is useful, because I can see what other teachers think of the resource's quality		
I consider ratings (stars) when I am choosing which resources to select for my teaching		
If I see that a user that I recognise by their username has given a good rating (many stars) to a resource, I am more likely to TRUST this resource to be high quality		
I trust more the ratings done recently (e.g., in the last year) than those from 2008 or before that		
I don't see the point of the rating		
I see the point of the rating, but I don't think it's helpful for me personally		
I could see myself giving ratings to resources which I have reviewed in the future		

Task 4

- 1. Go back to the ASPECT LRE portal.
- 2. Search for some resources from LRE freely.
- 3. Find one that you like and Add it to your 'favourites' (= Tag it).

You can do this by clicking 'Add to favourites' and then giving it a tag name, which you can remember.

4. Repeat this with two other resources.

Your favourite resources can now be found fast from the upper left corner of the portal.

5. Then answer the following questions based on the 'Tagging – Add to favourites' functionality.

Questionnaire 4

Select "yes" or "no":	Yes	No
I understand how the Tagging of resources works		
I think that tagging is useful, because I can then find the resources that I liked fast		
I think it's useful to look at which resources have others tagged when		



searching resources for my own teaching	
I consider other users' favourites when I am choosing which resources to select for my teaching (how many smiley faces there are)	
If I see that a user that I recognise by their username has selected a resource to their favourites, I am more likely to TRUST this resource to be high quality	
I don't see the point of the tagging/adding to favourites	
I see the point of the tagging/adding to favourites, but I don't think it's helpful for me personally	
I can see myself tagging resources/adding to favourites in the future	

3. ASPECT - Preparation for final workshop in Portugal

As you know, the final workshop will take place in Portugal, the weekend of the 7 to 9 of May 2010. In preparation, you will need to have basic knowledge on how to create a course in Moodle.

Have you ever created a course in Moodle?

- [..] Yes
- [..] No

Moodle training

As we said, you will need basic knowledge on how to use Moodle to create courses. Would you prefer...

- [..] To learn by yourself before the summer workshop
- [..] For ASPECT to organize a short Moodle training

Thanks for taking part of this workshop!



5.7 Workshop 3: Instructions to carry out Task 1

Task 1 - Packaged content and VLEs

1. You are going to create a simple lesson plan on Thermodynamics. Do not not worry if you are not a Physics teacher. The important thing is the format of the content, more than the content itself.

Log into the ASPECT LRE: http://portal.aspect-project.net/

In "Find by tags" search for: aspectUL-ws3

- 2. Log in Moodle: http://ariadne.cs.kuleuven.be/moodleASPECT/
- 3. You will have access as a Teacher (i.e., with editing powers) to 2 courses: Course 1 and Course 2. These courses will have your name in their titles.
- 4. Go to your Course 1
- 5. In Course 1 (box 1), you are going to work with "normal" (non-packaged) content.
 - 5.1 Inside box number 1, create a very short lesson plan including:
 - title
 - some text from the resource
 - an image from the resource
 - a Moodle forum to discuss the topic
 - a questionnaire on the topic used (e.g., 2+2? a)3, b)4, c)5).
- 6. In Course 1 (box 2), you are going to work with content packaged in SCORM format.
 - 6.1 Inside box number 2, re-create the lesson plan of the previous box:
 - Identify the SCORM packaged version of the same resource you used in box 1.
 - Download the package in a .zip format to your own computer (Desktop for example)
- Go back to your Course and in box 2 add the SCORM package (Add an Activity --> SCORM/AICC --> Choose or upload file --> Upload a file // Once uploaded --> Choose)
 - Play, reorder, remove, complement, as desired.
- Go through the package and compare it to the lesson plan you created yourself. What is missing? What would you need to do to "complete" it? What does the SCORM package allow you to do and what not?
- 7. Now go to Course 2.



- 8. In Course 2 (box 1), you are going to work with content packaged in Common Cartridge format as a whole.
 - 8.1 Inside box 1, re-create the lesson plan you already did in Course 1:
- Identify the Common Cartridge packaged version of the same resource you used in Course 1.
 - Download the package in a .zip format to your own computer (Desktop for example)
- Upload the resource to your course (Administration --> Files --> Upload a file // Once uploaded --> Restore --> Read + press Do you want to continue --> Continue --> (Attention!) Restore to Current course, adding data to it --> Continue)
 - Play, reorder, remove, complement, as desired.
- Go through the package and compare it to the lesson plan you created yourself in Course 1. Where did it get uploaded to? Did it stay in Box 1? Can you move parts of it to box 1? Can you erase parts? Can you add parts? What is missing? What would you need to do to "complete" it? What does the Common Cartridge package allow you to do and what not?
- 9. In Course 2 (box 2), you are going to work with parts of content packaged in Common Cartridge format.
- Identify the Common Cartridge packaged version that can be played on the Common Cartridge player.
 - Play Cartridge in Common Cartridge player.
 - Identify parts of Cartridge you would like to include in your lesson.
 - Select "Embed" --> Generate html --> Copy
 - 9.1 Inside box 2, re-create the lesson plan you already did in box 1:
- In Course 2, box 2, add a few parts of the Cartridge, including a questionnaire/test (Add a resource --> Link to a file or a web page --> Toggle HTML Source (<>) --> Paste code --> Save and display)
 - Play, reorder, remove, complement, as desired.
- Go through the package and compare it to the 3 other versions of the lesson plan you have already created: Can you move parts of it to box 1? Can you erase parts? Can you add parts? What is missing? What would you need to do to "complete" it? What does the Common Cartridge package allow you to do and what not?
- 10. Answer Questionnaire number 1

Name:

Country:____

Cartridge Packages:

Using normal web page

SCORM

Using IMS CC package

Taking just a part of the CC

package

(Task 1)

Using

(Task 2)

(Task 3)

package (Task 4)



Impossible to

5.8 Workshop 3: Questionnaire 1

Questionnaire number 1: Interoperability

Are you a focus group teacher: Yes/No.

	Really Easy (1)	Reasonable (2)	Some problems (3)	Quite Complicated (4)	impossible to use in everyday teaching (5)
Using normal web page (Task 1)					
Using SCORM package (Task 2)					
Using IMS CC package (Task 3)					
Taking just a part of the CC package (Task 4)					
2. Rate the three options on	how easy or	hard was it t	o set up a fo	orum in your le	esson plan
	Really Easy (1)	Reasonable (2)	Some problems (3)	Quite Complicated (4)	Impossible to use in everyday teaching (5)

After completing the lesson plan by using Web pages, SCORM packages and IMS Common

1. Rate the three options on how easy or hard was it to generate the lesson plan...



3. Rate the three options on how easy or hard was it to set up a questionnaire in your lesson plan...

	Really Easy (1)	Reasonable (2)	Some problems (3)	Complicated	Impossible to use in everyday teaching (5)
Using normal web page (Task 1)					
Using SCORM package (Task 2)					
Using IMS CC package (Task 3)					
Taking just a part of the CC package (Task 4)					

4. How big of a benefit can you see for your everyday teaching...

	That would be extremely helpful (1)	This could be a helpful in limited cases, for example when I am teaching online, or giving homework to students (2)	I cannot see any benefit for me (3)	I still don't understand how this would help me (4)
Using Moodle when teaching (Task 1)				
Taking an entire course in SCORM format and using it in Moodle (or my school's own System) (Task 2)				
Taking an entire course in IMS Common Cartridge format and using it in Moodle (or my school's own System) (Task 3)				
Taking a piece of the learning resource from one of the IMS Common Cartridge packages and using it with my other teaching materials (Task 4)				

5. How & for what purpose do you use materials found from the web? (Answer all the ways which you have used).



5.1. Classroom use:

[] I use the web materials to prepare my lessons [] I use web materials just to show something (like a video, image, an example) to my students in the class [] I use web materials to print out for the students [] I edited the materials I found from the web before showing them to my students [] I use web materials for home work to the students [] I use web materials for extra credit to the students (for the good students for more reading or the weaker students to improve their grades)
5.2. Online use:
[] I have taken materials as they are and published them in the Learning Management System of my own School. [] I have taken AND edited materials and published them in the Learning Management System of my own School. [] I have taken AND/OR edited materials and published them in the web in general (for example in a blog, Facebook, web pages, wikis) [] I use web materials to teach an online course to a group (Distance Learning)
5.3. Personal use:
[] I use web materials to gain knowledge, because I'm interested in the topic [] I use web materials to gain more confidence to speak in my class room [] I use internet for inspiration, but I do my materials mainly based on books [] I use web materials to improve my lessons pedagogically [] I use the web materials to check how other teachers have thought a certain topic/subject [] I use the web materials to enhancing my own materials
6. If you have taught an online course
[] I was in the same room with students studying on their computers (Same time, Same place) [] I was online at the same time, but (at least some of) the students were distance learning (Same time, different places) [] I had prepared the course in a way that the students could complete the learning tasks on different times, but using the school's computer class room (Different time, same place) [] I had prepared the course in a way that the students could complete the learning tasks on different times, from their own/school's computers (Different time, different places)

7. Which interface do you prefer if...

, , , , , , , , , , , , , , , , , , ,	nackage in	Cartridge	I think they are basically the same and I don't care
you are just showing the materials to the students in your	Woodic	Moodle	which one I use



class		
you are going to teach an entire online course via Moodle		
you are giving them online homework/extra credit work		

online course via Moodle				
you are giving them online homework/extra credit work				
8. I think that using SCORM pact [] I would save time because on individually, but I were [] Would take more time it would start saving ment [] I would lose time because [] I would lose time be really complicated	ause I would would get the at first, but time ause it's just	dn't have to import te whole package tonce I would lea too difficult for n	at once rn how to do ine to do	it properly - I think
9. I think that using IMS Commo	on Cartridge	packages in Moo	odle	
[] I would save time becaso on individually, but I value of the last saving ments of the last sa	would get the at first, but time ause it's just	te whole package tonce I would lea too difficult for n	at once rn how to do ine to do	t properly - I think
10. Describe how would you li those who cannot answer in Eng		-	ials? (Open q	uestion to support



5.9 Workshop 3: instructions to carry out Task 2

Task 2 – Content Access Control Mechanisms

- 1. Log into the ASPECT LRE: http://portal.aspect-project.net/
- 2. In "Find by tags" search for: aspectDRM
- 3. You will find a number of resources.
- 4. Go through at least 10 of them, checking one of the formats. Pay attention to how many resources you can access before you run into the 'Error message', which says: "It seems that you do not have enough credit to access this learning object."
- 5. Take note of things like: Can you view all the resources? Who do they belong to? When would it be clear for you that you would like to use one of these resources? Do you need to be able to see the resource before you can make a decision on whether or not you can use it? When/How would it be clear for you that you can use these resources?
- 6. Answer Questionnaire number 2



5.10 Workshop 3: Questionnaire 2

Questionnaire number 2: Content Access Control Issues

websites that are connected with books that you are using)
[] Yes
[] No
[] I do not know.
2. If yes,
Who makes the decision on which resources to buy?
[] The Head teacher alone
[] The Head teacher, after consulting with appropriate teachers
[] The Head teacher, after consulting with appropriate teachers and students
[] The Teachers
[] The Students
3. How do feel about using credits in order to access to Digital Resources that are not free?
[] I prefer to get resources for free and I don't think I would use credits
[] I don't mind credit-based access as long as I'm given enough credits and don't hav to purchase them
[] I have no problems in using credits-based systems to access Digital Resources
4. Do you:
Currently create your own learning resources? Yes/No
Intend to do so in future? Yes/No
Would you be motivated to share your own resources if you would get other resources in return (without a cost)? Yes/No
Would you be motivated to share your own resources if you would get paid extra to d them? Yes/No
5. How do you feel about credit-based access to materials, if you could gain credits by ratin other people's resources or by providing feedback on them?
[] I would definitely use this approach to gain credits myself - It would be great t 'earn' credits by reviewing and not having to pay money for them
[] Interesting idea, but I would like to try to first to see what it involves
[] I'm not sure if I would use this approach myself
[] Sounds like too much work for me
[] Don't see any benefits in rating content (for example with stars) or giving feedbac on them



6. How do you feel about credit-based access to materials, if you could gain credits by uploading resources you had created to the platform?
[] I would definitely use this approach to gain credits myself - It would be the natural way: I give some, I get some.
[] Interesting idea, but I would like to try to first to see what it involves
[] I'm not sure if I would use this approach myself
[] Sounds like too much work for me
[] I wouldn't want to share my content with others
7. How important on a scale from 1 to 10 is it that the educational resources you find in the web are free for you?
[1=not important - 10=vital]
8. If access to web materials is expiring within a matter of time, how long would you like that time to be? In other words:
How long does it usually take for you to prepare a lesson plan for one topic?
[] Less than an hour
[] One day
[] Couple of days
[] One week
[] One month
[] Longer
9. How long would you need to prepare an entire course?
[] One day
[] Couple of days
[] One week
[] One month
[] 2-3 months
[] 6 months
[] Longer
10. What would be the ideal access time to learning resources?
[] One hour
[] One day
[] Couple of days
[] One week
[] One month
[] 2-3 months
[] 6 months



[] 1 Year
11. In order to complete one lesson plan, how many resources do you think you generally use?
[] Just one
[] 2-3
[] 4-10
[] more than 10
12. In order to complete one entire course plan, how many resources do you think you generally need?
[] Just one
[] 2-3
[] 4-10
[] more than 10



5.11 Workshop 3: Instructions to carry out Task 3

Task 3 – Packaged Content features

- 1. Log into the ASPECT LRE: http://portal.aspect-project.net/
- 2. In "Find by tags" search for: aspectDRM
- 3. You will find a number of resources.
- 4. Go through at least 10 of them, checking and comparing the different formats:

View

- -as web
- -in player
- -- Common Cartridge
- --SCORM

Download

- -Common Cartridge / zip
- -SCORM /zip
- 5. Take note of things like: What benefits do you see of each format? Under what conditions would you use them? What would make them better for your use? What don't you like?
- 6. Log again into the ASPECT Moodle platform: http://ariadne.cs.kuleuven.be/moodleASPECT/
- 7. Go to your Course 2 and turn the editing on.
- 8. In Box 3 (Moodle and LRE), go to: Add a resource --> ASPECT Learning Object
- 9. Add a name and go to Choose an existing ASPECT learning object
- 10. Search for any keyword you want within ASPECT.
- 11. Have a look around the results found (see More details, resource, small icons on the right, etc and play with the refine your search options).
- 12. What do you think of this Moodle -- LRE connection? Can you use it to integrate resources in your Moodle course? In what formats are the resources found? What do you have to do to integrate the packages into the Moodle course correctly?
- 13. If you still have time, go back to your Course 2 and, again in box 3, go to: Add a resource --> ASPECT Learning Object, but now: Share a new learning object with ASPECT.
- 14. Upload a resource of yours (it can be just a text file or image you have in your laptop. Beware you will not be able to erase it afterwards, so don't upload anything private)
- 15. Search for your resource and see if you can find it!
- 16. Would you find this feature useful? Would you use it to share your resources?
- 17. Answer Questionnaire number 3



5.12 Workshop 3: Questionnaire 3

Questionnaire number 3: Features of SCORM and IMS Common Cartridge

1. Sort from 1 to 8, how useful the following SCORM and IMS Common Cartridge functionalities would be for you $(1 = most useful, 8 = least useful)$:
[] Being able to adapt the sequence in which the learning content is presented to the student (Control which parts the students see first and which last)
[] Being able to include questions that give feedback to the students (if they answer right or wrong, the question gives feedback, for example "That was correct")
[] Providing access to eBooks or other applications, without requiring users to sign in again (less usernames and passwords to remember)
[] Being able to show different things to teachers, students or mentors and control who sees what
[] Being able to take an entire course/lesson and putting it easily as a whole package to your Learning Management System?
[] Being able to take any piece of a resource and embed it into a wiki, blog, social networking site, your LMS
[] Being able to include forums for discussions
[] Being able to find packaged resources which would support my national curriculum
2. If high quality materials would be available in SCORM format, would you use them?
[] Yes
[] No
3. If high quality materials would be available in IMS CC format, would you use them?
[] Yes
[] No
4. Which interface would you prefer if

	Web page	SCORM Player view	Common Cartridge player view	SCORM package in Moodle	IMS Common Cartridge package in Moodle	I think they are basically the same and I don't care which one I use
you are just showing the materials to the students in your class?						
to teach an						



entire online course?			
you are giving them online homework/extra credit work?			

5. Describe what an ideal SCORM/IMS Common Cartridge player should be able to do for	r
you? (Open question to support those who cannot answer in English in the discussions)	
6. Which one do you prefer?	

[] Using bits of materials you find in the web and mixing them with other materials
[] Using an entire package (a course or a lesson) and following that material in your teaching

7. How often do you need...

	Stable structured materials, which you cannot edit, but can be used as a package	Flexible materials, which you can adapt to your own teaching
Daily		
Weekly		
Monthly		
Rarely		
Never		

9.	What would	be the requiremen	ts for a	content	package,	so that	you	would	start	using	it for
yc	our teaching?	(content wish list)									

1=This is vital (without it, I won't use the package)

2=This would be nice, but not necessary

3=I don't need this

[1-3] include videos

The pac

ckage should
[1-3] include Web content
[1-3] include Web links
[1-3] include questions/assessments (which would give feedback to the answerer)
[1-3] include discussion forums
[1-3] include high quality materials
[1-3] control the roles (Teacher sees different than what student sees)
[1-3] include direct access to eBooks on the topic



[1-3] include simulations or other interactive	flash content						
[1-3] control the tasks open for students by what tasks they have already completed							
[1-3] include an easy way of taking small b Learning Management system, blog or Social		to be uploaded to a					
[] Something else, what?							
10. Based on what you've seen about SCORM and which learning theories would you say they support:	IMS Common Cartrid	ge Packages today,					
They support	SCORM	IMS Common Cartridge					
Behaviorism							
Constructivism							
Cognitivism							
Multimedia-based learning							
Connectivism							
Self-studying							
Problem-based learning							
Social Constructivism							
Inquiry-based learning							
Extrasomatic pathways learning							
(Cultural or extrasomatic information is information that is deliberately stored in external artifacts, i.e., remember how you found the information, not the information itself)							
11. Do you think that web materials in general are mo [] Self-teaching or [] Blended learning (with a teacher)	ore helpful for:						



6 Conclusion

This deliverable described the experiments carried out and presented the methods and materials used to elicit feedback from 4 groups of about 10 teachers from Belgium (Flemish Community), Lithuania, Portugal and Romania (the results of these experiments for each national group of teachers are presented in deliverable D6.4).

The feedback obtained during these experiments was indirect. Teachers were not testing specifications and standards but tools and content implementing these specifications and standards. However, in some cases, this feed-back helped to address the perceived disconnect between "standard makers" and school teachers. Examples of tools, services, and specifications that have benefited from this feedback include the Icodeon Common Cartridge platform, the new LRE for schools portal (http://lreforschools2011.eun.org/), and the LRE Metadata Application Profile version 4.5.2 (http://lre.eun.org/node/6).

² The Icodeon Common Cartridge platform is accessible via the ASPECT and LRE for Schools portals. The integration between these portals and the platform has evolved during the project to take into account evolution in specifications partly motivated by the feedback collected during the ASPECT school pilots.