

Newsletter – July 2012



# → Testing is finalised

February to June 2012 has been a critically important time in the life of the AHELO feasibility study with the project entering its second phase: the implementation of the instruments. The field testing of the economics, engineering, generic skills and contextual instruments has been finalised in all 17 countries/economies participating. As of 30 June 2012, data have been collected from over 23 000 students, over 4 900 faculty and more than 270 institution coordinators across all participating countries.



The ACER-led implementation of the AHELO feasibility study in 17 countries has involved numerous organisations, groups and individuals around the world in a large number of complex and multifaceted activities. For instance, fieldwork has involved around 30 000 people, at least a thousand test sessions and perhaps 20 000 computers. In most cases students were offered several possible times to take the test but, in a few cases, institutions provided just one test session for all students.

Fieldwork went well overall, and data collection went smoothly for most participants, although some encountered difficulties. The fieldwork phase has generated a range of valuable insights and lessons learned for everyone involved in what has likely been the largest computer-based international assessment completed to date in the higher education context.

As at 30 June scoring of the student answers is finalised in all but two countries. With all fieldwork completed, data files are being built and validated. Work is commencing on the next phase of the AHELO feasibility study – data analysis and reporting.



## What have we learnt so far?

Overall, significant progress has been made in implementing AHELO, and equally in establishing feasibility. Major outcomes have been achieved, particularly the sampling of students and faculty in institutions across many countries, successful testing of more than 23 000 students and data collection from almost 5 000 faculty and more than 270 institutions, and the completion of scoring in all but two countries.



Although it is too early to draw definite conclusions about the practical aspects of the feasibility of an AHELO, initial observations from countries' experience indicate a variety of scenarios from which lessons will be drawn. For example, while some countries and their institutions experienced difficulty in motivating students to sit the test, others achieved student participation rates of over 80%.

There has been international agreement on frameworks and instruments. Based on the feasibility study findings to date, there are genuine and sound indications that much of AHELO is feasible.

An interim feasibility report has now been released, which shows that:

- It is possible to define and agree on discipline-specific learning outcomes internationally, as proven by the development and international validation of the Economics and Engineering Assessment Frameworks and instruments.
- In terms of developing tests that can be applied cross-nationally, cross-culturally and crosslinguistically, there is evidence that the AHELO tests for generic skills, economic and engineering have been translated, adapted and verified independently to international standards, in a transparent process and in all participating countries.
- The fieldwork phase, which has just been finalised, shall provide more insights into test adaptation and translation, as well as other issues related to the feasibility of sampling students and faculties, participation rates, scalability of test systems, scoring etc.

#### > Download the Interim Feasibility Study report on our website www.oecd.org/edu/ahelo

#### Where do we go from here?

With the feasibility study now moving towards completion, ACER will provide an evaluation of the outcomes including through extensive psychometric analysis of the data. An OECD Report examining the results and findings will be issued in December 2012 to conclude the feasibility study.

But that is not the end of the story. The feasibility study has brought to the surface a number of important broader questions about measuring learning outcomes that must be addressed before a full AHELO survey could be launched.







These deeper questions include:

- What are the desired learning outcomes of higher education and what can/should be measured?
- Is the main purpose of an assessment instrument for measuring learning outcomes to underpin accountability, provide data for improvement or enhance transparency – or all of these?
- Who or what is really being assessed the students or their higher education institutions?
- Is the purpose to measure the level of competency achieved or to measure the value added from attending a specific higher education institution?
- What can an international assessment provide that national or institutional level instruments cannot – and vice versa?
- How might international measures of learning outcomes be misused?

## The Feasibility Study Conference

The OECD will co-host a major, invitation-only conference on 14-15 March 2013 to present the results of the feasibility study. The conference *Skills for life: Can we test students globally, and how?* will be co-hosted by the HU University of Applied Sciences Utrecht, the Netherlands. It will also provide an opportunity to reflect on these deeper questions about learning outcomes of higher education and consider the way forward.



The AHELO team recently visited the 2000 year old medieval city of Utrecht to plan the feasibility study conference. The conference centre is a short ride away from the city centre. Ultra modern facilities will allow for a highly interactive conference and a smooth transition between various sessions. The facilities will also encourage working together as well as provide networking opportunities.

A mere 30 minutes away from Amsterdam-Schiphol airport, Utrecht has much to offer architecturally and culturally. The city is small enough to explore on foot and offers a rich historical background. All of these elements will certainly contribute to a successful, enriching and pleasant conference.



Further details on the conference will be available on our website (www.oecd.org/edu/ahelo) in September. To be informed on developments regarding the Conference please contact ahelo@oecd.org.



## ➔ Perspectives from the field

As fieldwork has now come to completion, it is important to acknowledge the work done by the national teams. They have worked energetically, conscientiously and enthusiastically to complete all activities within time limits. We have asked a sample of national and regional representatives who were involved in the feasibility study on the ground to give us their take on this experience.

The Canadian province of Ontario is participating in the civil engineering strand of the AHELO feasibility study. Joining the project in July 2011, the Higher Education Quality Council of Ontario (HEQCO) quickly began recruiting institutions and a lead scorer, as well as adapting documents for the Ontario/Canadian audience.

Nine out of ten institutions that offer civil engineering programs immediately agreed to participate in the project, noting the importance of this international assessment. Interest in and appreciation for the project continued throughout the winter and spring of 2012 when the test was put into the field. Nearly 60% of the province's civil engineering graduating class participated in the assessment, with institutional response rates ranging from 48% to 78%.

The remarkable response rates can be attributed to strong leadership from the institutional coordinators who successfully engaged their institutions, departments, faculty members and students. The creative student recruitment strategies developed at each institution were a key element of the success of Ontario's test administration.



the Ontario scoring team



In Finland twelve higher education institutions (HEIs) conducted the implementation phase. Institutional coordinators were trained at the end of January 2012 and the first institution started testing students at the end of February. Typically HEIs organised several testing sessions in which students were able to register beforehand via intranet.

Given the extremely tight schedule the implementation phase was a relatively smooth process. There were only few - mainly technical - problems in some of the HEIs. For example, some HEIs had very strict setting in their firewalls thus blocking access to testing interface. In general students found the test to be interesting yet challenging.



The main drawback in Finland, however, was the poor involvement of students in the testing. Altogether only 331 students out of 2400 completed the test. There were several reasons for this: students at the end of their bachelor's degree tend not to be on campus anymore during their final term; lack of internal incentives such as individual feedback of the success of the test or ECTS points; external incentives (which all HEIs provided such as iPad or cell phone lotteries, free movie tickets etc.) were not regarded as attractive enough; institutional coordinators did not have enough time to motivate sampled students. Hence in a fully-fledged AHELO, motivating students will be a major issue in Finland.



Pictured members of the Finnish team: Jani Ursin (NPM), Helena Aittola (scorer) and Kari Nissinen (Lead Scorer)



Japan

#### **Engineering strand**

The implementation of the AHELO engineering instrument took place in Japan between April 26 and May 25, involving 12 public and private universities from around the nation and 504 students. The responses were scored by 13 professors, during a four day scoring session in early June. Although there were several incidences of online access failure, we believe that can be prevented in the future by better preparation. Overall, the exercise proved to be technically feasible.

We would like to take advantage of this opportunity to share with colleagues what we have learned from AHELO, which has, indeed, been an invaluable learning experience. The Japanese AHELO team, consisting of engineering experts, higher education researchers, government officials, and staff from the National Institute for Educational Policy Research (NIER) who care sincerely about the quality of higher education, has come to agree that there is strong potential in AHELO to become a powerful tool for educational improvement, based on the following observations.

Firstly, AHELO has allowed us to understand tangibly and substantively that there is a conceptual framework of engineering competencies and learning outcomes that can be shared globally. We believe that through further deliberation, a higher level of sophistication can be achieved.



the Japanese scoring team

Secondly, AHELO's performance tasks which aim at measuring students' innovative thinking have been eye-opening. Our engineering experts are beginning to question whether they have been successful in helping their students acquire the competencies recognized as important in the global community.

AHELO is important because it provides concrete and globally shared ideas for conceptualizing and measuring competencies and learning outcomes. We would like to emphasise that instruments and scoring rubrics be made fully accessible to relevant communities, in order for AHELO to fulfil its potential of becoming a powerful tool for educational improvement.







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Mexico

### Participating in all three strands

With the support of the Ministry of Education, Mexico enthusiastically joined the 3 branches of the AHELO project since there is the need to emphasise the evaluation of results from qualitative approaches to measure the development of student skills. The application of the test was successful by involving 2 925 students who recognised that they were not familiar with this type of testing, but showed interest and a desire to receive feedback on their performance.



The AHELO National Project Managers for Mexico.

Mexico has deployed a large mobilization around the AHELO test by involving:

- about 832 teachers,
- about 179 test administrators,
- 84 administrators from 14 institutions of higher education in the various educational subsystems and regions around the country.

**Special focus on the Economics Strand:** In this strand, the ten participating HEIs cover a wide range of institutions, mostly public regional universities, as well as national and technological institutes. 405 students and 210 professors were involved in the testing. The HEIs wished to be involved in order to contribute to the much needed development of *second generation* instrument of evaluation of learning. Although they knew that feedback for students will be limited, they encouraged participation and students were highly motivated. Throughout the project, a management team, more than 50 coordinators, test administrators, evaluators and administrative staff, were involved. Financial assistance was provided by the Federal Government and each participating HEI.

	United States (Connecticut, Missouri, Pennsylvania)	Generic Skills strand
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All eleven U.S. institutions participating in the AHELO Generic Skills strand followed the international protocols and met the short timelines for assessment administration. Now the question is did we achieve student participation rates sufficient to provide useable data?

In Missouri, three public and two private institutions took advantage of their substantial experience in assessment to prepare the samples, administer the assessment, and complete other project components with few serious hitches. Perhaps their biggest challenge was integrating yet another assessment into an already busy testing schedule. While they were more successful than other U.S. institutions in motivating students to participate, none achieved the goal of a 75 % participation rate.



In Connecticut, the single public institution participating in AHELO benefited from exceptional institutional commitment and capacity at all levels, but needed to use several approaches to convince students to participate in the assessment. But much was learned along the way of value to the institution and the AHELO project.

In the Pennsylvania State System of Higher Education (PASSHE), the five participating institutions were at earlier stages in developing a "culture of assessment." At first, several struggled to draw their samples and establish their assessment schedules and procedures. While their participation rates were on the lower side, they may already have gained more from participating in AHELO than other institutions.

All of the participating U.S. institutions maintained logbooks of dates, details and reflections on their participation in AHELO, which will provide essential documentation for institutional reports as well as institutional input for our national reports and OECD. In brief, the experience of U.S. participants to date is that the challenges of AHELO instrument administration can be overcome and the experience gained is well worth the efforts required. Now we await the return of data and the prospects of a fullscale AHELO project in the future.



**July 2012** 

## Find out more

- → On our website: www.oecd.org/edu/ahelo:
- Brochure
- ➔ Detailed Project Update
- ➔ Essential documents
- Who's who in AHELO



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