Research and Innovation Taskforce

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71 Total Responses

Key Faculty Concerns:
- Lack of Knowledge
- Concerns over Quality
- Lack of Time
- Lack of Infrastructure
- Concerns over Intellectual Property

3rd Party OER will constitute 50% of all courses in the next 5 years

- 1 (Strongly disagree)
- 2
- 3
- 4
- 5 (Strongly agree)

Nearly 71% either agreed or strongly agreed that how education is delivered will substantially change over the next decade.

Hot topics for 2015: Quality, Open access to online education, Faculty workload and student drop out

82% surveyed wish to collaborate further

Hot pedagogies for 2015:
- Blended Learning
- Quality
- Use of Open Content
- Learning design
- Seamless & Mobile Learning

Approximate percentage of innovation budget spend for learning & teaching

Hot technologies for 2015: Learning analytics, MOOCs, Social Networking and Virtual Environments

Learning Analytics
MOOCs
Eportfolios
Learning through games
Virtual environments
Social networking
Executive Summary

This research was conducted by the Research and Innovation Taskforce in 2014 for ICDE to better understand the state of research and innovation in open, distance, flexible and online education, including e-learning across ICDE members.

This research was conducted in the form of a survey disseminated to ICDE members in October to December 2014. Analysis of data demonstrated a number of trends as well as insight into next steps.

In concluding this stage of the research the following elements are reported:

• That the respondents targeted for the survey was correct for their ability and knowledge of their institutions strategies

• That a wide range of educational institutions from within the ICDE members responded, ensuring that the data was not skewed toward predominantly large or small institutions.

• That resource is primarily provided centrally for innovation in learning and teaching however, predominately this equates to a low percentage of total spend across the institution.

• Educational institutions highlighted that future research might focus on MOOCs and OERs. Although, flipped classrooms was a reoccurring theme which is in line with broader developments globally within the education sector. Quality issues remain a topic of concern.

• According to respondents it was felt that learning analytics and blended learning would be of immediate concern over the next 12 months.

• The most prevalent concerns in using new technology for teaching and research was a lack of knowledge about technologies and the corresponding fast pace of change along with adequate and appropriate professional development of staff.

• Approximately 60% of respondents either disagreed or strongly disagreed that in ten years that there would only be a small group of global providers comprising of large brand universities and companies.

• The split was fairly even with regards to whether the majority of teaching will be online in the next five years. However, 42.11% agreed and 7.02% strongly agreed that automated assessment and analytics will form at least half of the student feedback within five years.

• There was an acknowledgement towards the movement for increased inclusion of open content constituting to at least 50% of all courses within five years.

• Nearly 71% of respondents either agreed or strongly agreed that how education is delivered will substantially change over the next decade.

• A strong and encouraging response of 82.84% was had from respondents wishing for further collaboration within the ICDE network to undertake research, with 87.27% responding positively to publication and dissemination of this research.
From the data and conclusions, the following is recommended for implementation:

• That the survey is conducted bi-annually to update research and innovation themes for foci.

• That further information, guidance, etc. with regards the prioritised areas such as use of learning analytics, blended learning, staff professional development through the commissioning of short insight reports.

• That a member of the ICDE Executive become the sponsor of the Research and Innovation Taskforce to:
  • Commission insight papers from the membership or from other experts for a fee
  • Coordinate the bi-annual running of the survey
  • Develop a communication and engagement plan
  • Consider possible joint programmers and projects for funding across different regions of the ICDE membership (eg. ICDE Doctoral Consortium)

From the data and conclusions, the following might be considered:

• That secondary evidence gathering is undertaken to complement this survey. Nearly half of the 77 respondents provided their details with permission to be contact for further research. This evidence could be collected by a further survey or telephone interviews.

**Project Objective**

The International Council for Open and Distance Education (ICDE) is the leading global membership organization for open, distance, flexible and online education, including e-learning, and draws its membership from institutions, educational authorities, commercial actors, and individuals.

As the global membership organization in open and distance education, ICDE’s mission is to:

• Foster international collaboration

• Promote intercultural cooperation and understanding

• Support and develop networks at national, regional and linguistic affinity groups levels

• Provide fora where individuals, corporations, institutions, governments and associations can engage in professional interaction in the field of open, distance, flexible and online education, including e-learning. Contribute to the development and application of new methodologies and technologies to improve lifelong learning

Encourage the development of best practices and standards in open, distance, flexible and online education, including e-learning. The new ICDE Strategic Plan highlighted that members would like to be more informed about research and innovation within distance education and it is with this in mind that the ICDE Executive agreed and proposed that a Research and Innovation Taskforce be established to
conduct a meta-study on the state of play regarding research and grand challenges in ODL and advise the ICDE Executive Committee on R&I issues.

Distance education is facing a number of threats and opportunities currently, often accompanied by rhetoric and media speculation, but with little research and evidence. This makes it difficult for many Distance Education institutions to frame an effective response. For example, how should they respond to MOOCs? There has been a good deal of hype surrounding these, and now a backlash may have begun. Should they be ignored or embraced enthusiastically? Which form of MOOC is best to pursue given individual contexts? What models, pedagogic, technical and financial, might be adopted? It is these types of questions that the project hopes to address in a range of areas, such as learning analytics, open educational resources, quality assurance, learning design, informal assessment, etc. By providing objective, grounded analysis the project will inform decision makers in the ICDE.

The benefits of this project are numerous. Not least, in providing objective insight of the research and innovation agenda in open, distance, flexible and online education, including e-learning for the stakeholders of ICDE. The many member institutions and organisations of ICDE will find the outcomes useful and applicable at local levels as issues may well be similar. Full benefits realisation description will be developed as an outcome of the project.

The focus of the Research and Innovation Taskforce is to:

- Initiate a meta-study on the state of research and innovation in open, distance, flexible and online education, including e-learning
- Identify the grand challenges of research in open, distance, flexible and online education, including e-learning
- Encourage cooperation amongst ICDE members on research and innovation (R&I); and
- Advise the ICDE Executive Committee on R&I issues.

**Working Group Members**

Professor Belinda Tynan, The Open University (Project Accountable Executive and Chair)

Hannah Gore, Project Manager and Research Assistant, The Open University

Dr Theresa Koroivulaono, University of the South Pacific

Dr Vijay Kumar, Massachusetts Institute of Technology

Professor Mpine Makoe, University of South Africa

Dr Albert Sangra, Universitat Oberta de Catalunya

Dr António Moreira Teixeira, Universidade Aberta

Dr Martin Weller, The Open University
Current Research and Innovation State of Play

The Research and Innovation Taskforce was established by the Standing Committee of Presidents (SCOP) in January 2014 by the International Council for Open and Distance Education (ICDE).

The Taskforce aim was to publish an authoritative account of current themes and priorities in supporting research and innovation in distance and e-learning, in order to prove a basis for the improvement of research and innovation in this field of practice. The accounts of current practice and major themes of the ICDE member organisations represent an important element in that work.

Capturing the Issue

To capture this issue, research into a beta survey began in July 2014, with the Taskforce enlisting the support of a doctorate research assistant from The Open University to aid the beta testing of the survey, and the operation and collecting of the results of the main study.

The best practice selected was to collate the relevant questions in August 2014 for the survey into SurveyMonkey to administer and distribute as a beta test utilizing the contacts of the Taskforce to thoroughly test the beta questions in September 2014. These results in conjunction with the feedback given from the participants was analysed in October 2014 with recommendations has to how best to proceed with the formal survey.

The formal survey was launched on 17 October 2014 via the ICDE mailing list and dispatched to all ICDE members. The survey remained open until the end of December, whereby 71 responses were captured, of which 57 were fully completed (no questions skipped).

The survey can be accessed for viewing at https://www.surveymonkey.com/s/3YGXKQM

Key Research Findings

Of the 69 respondents for Question 1, 85.51% of the institutions taught at a postgraduate level, 79.71% at an undergraduate level, 18.84% at a college level, and 7.25% at K12.

Sixty two responded to Question 2 whereby 30.65% were at Director level, 12.90% at Senior Executive, 1.61% at Pro Vice Chancellor, and 12.90% at Vice Chancellor. This aided to demonstrate that the correct demographic was targeted via the mailing list to respond to strategic questions regarding institutional research and innovation strategy.
In the 70 responses given in Question 3, 55.71% stated that their institution was evenly split between teaching and research, 38.57% were predominantly teaching based, and 5.71% were predominantly research based.

In Question 4, respondents were asked to define the number of full time students that their institution teaches, of the 66 that responded 24.24% selected 20-50,000, 15.15% at 10-20,000, and 10.61% at 5-10,000. A total of 19.70% selected 5,000 students or less, with 15.15% selecting 50-100,000 and a further 15.15% selecting over 100,000, demonstrating a clear span of student population for institutions.

For Question 5 the respondents identified the methods they use for the delivery of learning to their students. Of the 67 responses, 67.16% stated online at a distance, 55.22% stated a blended approach of online and face to face, 41.79% selected face to face, and online local to institution and ‘other’ received 19.40% each. However, in the free text field the responses given to ‘other’ suggest that the institutions were conducting a blended approach utilising a combination of face to face and video conferencing.

The next question aided to identify the location of the institutes that were responding with 35.71% responding with Europe, 25.71% with Asia, 15.71% with Africa, 14.29% with North America, and 2.86% responding each with South America, Middle East, and Oceania.

Question 7 linked to Question 5 with respondents being asked what the main teaching method was in their institution. Of the 70 that responded, 47.14% selected distance, 31.43% mixed approach, and 21.43% selected on campus.

Of the 70 respondents for Question 8, 84.29% acknowledged a membership with ICDE, 12.86% declared no to be a member, and 2.86% didn’t know.

Question 9 asked to ascertain the level of resource provided centrally for innovation in learning and teaching by their organisation. Of the 59 that responded 30.51% stated that over US$200,000 was provided, 23.73% selected US$0-50,000, 11.86% selected US$50-100,000, 5.08% selected US150-200,000, and 3.39% selected US100-150,000. 25.42% responded that they didn’t know the level of resource provided.

Question 10 continued on from Question 9, by asking approximately what percentage of budget spend does the innovation resource represent within their organisation. Of the 60 that responded 38.33% selected a representational spend of 0-5%, 15.00% selected 5-10%, 6.67% selected 10-20%, and 11.67% selected over 20%. 28.33% stated that they didn’t know the representational spend.

Sixty respondents answered Question 11 about the level of research undertaken within their organisation to inform their development of learning and teaching. 41.67% stated some of this activity was undertaken
by a small specialist group, 20.00% stated that ‘quite a lot’ was undertaken by a small specialist group, 16.67% stated that a lot of this activity was by a wide range of educators, with 10.00% stating only some of this activity is undertaken by a wide range of educators. 8.33% responded that they didn’t know, with 3.33% stating none. Question 12 continued along this theme, in asking how the research relating to learning and teaching was shared within the organisation. In the responses 26.53% mentioned seminars, 22.45% conferences, 22.45% research, 20.41% publications, 14.29% presentations, 14.29% papers and 10.20% mentioned workshops.

The next four questions concentrated upon reflections and horizon scanning in research and innovation.

Question 13 asked what piece of research or scholarship in the last five years about open, distance or online education has had the most profound effect or influence on their organisation. From the 44 responses given, common themes were MOOCs (11.36%), OER (9.09%), distance education (9.09%), higher education (6.82%) and flipped classroom (4.55%). Question 14 asks respondents to horizon scan and select the three topics that will be most important generally over the coming year, 57 responded with; Quality (61.40%), open access to online education (49.12%), faculty workload (33.33%), student drop-out (33.33%), online distance models (31.58%), university funding (28.07%), learning environments and spaces (24.56%), accreditation to prior learning (21.05%), rising cost of higher education (17.54%), learner workload (10.53%), and gender issues (3.51%). For Question 15, the focus moved to horizon scanning to select the three topics relating to technology developments that will be the most important in the coming year, 57 responded with; learning analytics (71.93%), MOOCs (54.39%), virtual environments (54.39%), social networking (54.39%), badging and informal assessment (43.86%), learning through games (21.05%), and eportfolios (10.53%). Question 16 asked respondents to horizon scan and select the three topics relating to pedagogy developments that will be the most important in the coming year, 57 responded with; blended learning (56.14%), use of open content (47.37%), quality (45.61%), learning design (43.86%), seamless and mobile learning (35.09%), networked approaches (31.58%), social learning (29.82%), and adaptive learning (26.32%).

Questions 17 to 19 captured the concerns of the respondents, with Question 17 asking what the key concern for faculty with regard to using digital, networked technology for teaching was, 54 responses were gathered with lack of knowledge scoring highest at 33.33%, followed by concerns over quality (22.22%), lack of time (20.37%), lack of infrastructure (18.52%), concerns over privacy (3.70%), and concerns over control (1.85%). Question 18 asked what the key concern for faculty with regards to using
new technology for research was. Fifty one responded again with lack of knowledge scoring the highest at 35.29%, lack of infrastructure (17.65%), lack of time (15.69%), concerns over intellectual property (11.76%), concerns over quality (11.76%), and lack of relevance (7.84%). Question 19 asked respondents to identify which two key strategic concerns they thought their institution faced with regards to new technology. The 54 responses were: establishing robust learner systems (35.19%), professional development of staff (31.48%), adapting pedagogy to take advantage of the internet (27.78%), developing an online presence (24.07%), developing a MOOC strategy (24.07%), costs (20.37%), making use of online content effectively (14.81%), organisation and management (12.96%), having an effective social media policy (7.41%), instructional design (7.41%), and disseminating research effectively (3.70%).

Question 20 asked whether there were any issues relating to open and distance education that relate specifically to your geographical region or context? Thirty responses were given, from the text analysis 33.33% of the issues related to students, 20.00% to access, 16.67% to education, 6.67% each to online distance education, region and social respectively.

The respondents were asked to horizon scan again with regards to the scenarios with Question 21 stating in ten years’ time there would be a small group of global providers of education, consisting of large brand universities and companies and most existing universities will cease to operate. Fifty seven participants responded with 31.58% disagreeing, 29.82% strongly disagreeing, 28.07% remaining neutral, 10.53% agreeing, and no respondents strongly agreeing. In Question 22 participants were asked whether the majority of teaching will be online within the next five years. Fifty seven responded 31.58% agreeing, 24.56% disagreeing, 19.30% remaining neutral, 14.04% strongly disagreeing, and 10.53% strongly agreeing. Question 23 asked whether we will use automated methods including learning analytics and automated assessment for at least half of the student feedback within five years. Fifty seven responded with 42.11% agreeing, 24.56% remaining neutral, 17.54% disagreeing, 8.77% strongly disagreeing, and 7.02% strongly agreeing. For the final two horizon scanning questions in Question 24 participants were asked whether third party, open content will constitute 50% of all courses within the next 5 years, 56 responded with; 35.71% agreeing, 30.36% remaining neutral, 19.64% disagreeing, and both 7.14% either strongly agreeing or strongly disagreeing. Question 25 posed the question as to whether the way we deliver education will not change substantially over the next decade. Fifty seven participants responded with; 40.35% disagreeing, 29.82% strongly disagreeing, 14.04% remaining neutral, 14.04% agreeing, and 1.75% strongly agreeing.

Final report, April 2015
The final two questions of the survey related to further research. 57 respondents to Question 26 when scoping for interest in further collaboration within the ICDE network to undertake research in specified topic areas. 82.84% responded yes and in Question 27, 87.27% responded positively to the publication and dissemination of short abstracts, surveys, short briefing papers, literature reviews, etc. being circulated regarding said research.

Of the 71 participants, 33 provided their contact details for further research with the Taskforce.

**Conclusions and Recommendations**

- That the respondents targeted for the survey was correct for their ability and knowledge of their institutions strategies.
- That a wide range of educational institutions from within the ICDE members responded, ensuring that the data was not skewed toward predominantly large or small institutions.
- That resource is primarily provided centrally for innovation in learning and teaching however, predominately this equates to a low percentage of total spend across the institution.
- Educational institutions highlighted that future research might focus on MOOCs and OERs. Although, flipped classrooms was a reoccurring theme which is in line with broader developments globally within the education sector. Quality issues remain a topic of concern.
- According to respondents it was felt that learning analytics and blended learning would be of immediate concern over the next 12 months.
- The most prevalent concerns in using new technology for teaching and research was a lack of knowledge about technologies and the corresponding fast pace of change along with adequate and appropriate professional development of staff.
- Approximately 60% of respondents either disagreed or strongly disagreed that in ten years that there would only be a small group of global providers comprising of large brand universities and companies.
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- There was an acknowledgement towards the movement for increased inclusion of open content constituting to at least 50% of all courses within five years.
- Nearly 71% of respondents either agreed or strongly agreed that how education is delivered will substantially change over the next decade.
- A strong and encouraging response of 82.84% was had from respondents wishing for further collaboration within the ICDE network to undertake research, with 87.27% responding positively to publication and dissemination of this research.
From the data and conclusions, the following is recommended:

- That secondary evidence gathering is undertaken to complement this survey. Nearly half of the 77 respondents provided their details with permission to be contacted for further research. This evidence could be collected by a further survey or telephone interviews.

- That further information, guidance, etc. with regards the use of learning analytics, blended learning, staff development and new educational technologies be considered for dissemination by ICDE through a variety of mechanisms.

- That ICDE identify mechanisms for the creation of a Working Group to support ongoing engagement with the issues identified.

- That ICDE review the TORS of the Research and Innovation Taskforce for future focus including whether or not to extend the Research and Innovation Taskforce activities into a Working Group to investigate specific issues in cooperation and collaboration with ICDE members.

**About ICDE Projects**

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To encourage the development of best practices and standards in open, distance, flexible and online education, including e-learning, the new ICDE Strategic Plan highlighted that members would like to be more informed about research & innovation within distance education. It is with this in mind that the ICDE Executive Committee agreed and proposed that a Research and Innovation Taskforce be established to conduct a meta-study on the state of play regarding research and challenges in research and innovation in education and advise the ICDE Executive Committee on the resulting issues.

Distance education is facing a number of threats and opportunities currently, often accompanied by rhetoric and media speculation, but with little research and evidence. This makes it difficult for many Distance Education institutions to frame an effective response. By providing objective and grounded analysis, the projects will inform decision makers in ICDE.