

CREATIVE THINKING

Re-imagining the University

8th Galway Symposium on
Higher Education

National University of Ireland, Galway

10th and 11th June, 2010

Centre for Excellence in Learning & Teaching

NUI Galway

Galway

Ireland

Website: <http://www.nuigalway.ie/celt>

Symposium Blog: <http://ollscoil.blogspot.com>

SECTION 1: INTRODUCTION	1
Welcome & Introduction	2
SECTION 2: SYMPOSIUM PROGRAMME	3
Parallel Sessions	5
SECTION 3: KEYNOTE SPEAKERS- BIOGRAPHIES	17
3.1 Prof. Anna Craft.....	18
3.2 Prof. Norman Jackson.....	19
3.3 Prof. Timothy Emlyn Jones	20
3.4 Prof. Keith Sawyer	21
3.5 Dr. Anna Newell	22
3.6 Prof. Finbarr Bradley.....	23
SECTION 4: PAPER AND POSTER ABSTRACTS.....	24
SECTION 5: GENERAL INFORMATION FOR DELEGATES	37
5.1 About the National University of Ireland, Galway	38
5.2 Campus Map	39
5.3 Galway City Map.....	40
5.4 Symposium Registration and Information Desk.....	41
5.5 Transport	41
5.6 Internet Access	41
5.7 Messages	41
5.8 Personal Property.....	41
5.9 Symposium Dinner.....	41
SECTION 6: BIBLIOGRAPHY	42

Section 1

Introduction

Welcome & Introduction

Dr. Iain Mac Labhrainn

Director of the Centre for Excellence in Learning and Teaching (CELT), NUI Galway

You are very welcome to this, the eighth Galway Symposium on Higher Education. The theme of creativity is being broadly interpreted for this event (after all, nothing like lateral thinking!) and we wanted to provide an opportunity for people from many different backgrounds to share ideas and discuss the challenges of working in higher. There's no doubt in the midst of the current global economic uncertainty that there's a need for fresh thinking and new approaches, but whilst that may sound somewhat like a cliché, we would contend that it is through the power of imagination, creativity and knowledge sharing that we become fulfilled not just as academics, but as engaged citizens.

...it is through the power of imagination, creativity and knowledge sharing that we become fulfilled not just as academics, but as engaged citizens.

This gathering will not of course lead to radical transformation of the education system, never mind wider society (although no doubt we'll see some fine examples of imaginative discussion on these topics at the conference social event!) but we do hope that it will at least provide an opportunity to step away from the mad rush of semesters, exams, malfunctioning lab equipment and yet more government strategy documents. A chance to gather breath, meet with other

like-minded (and different) colleagues, which will help us realise that we share common interests and goals. Perhaps it will also help to remind us that one of the most distinctive yet often hidden beauties of a university is its role as a city of ideas, a place where disparate disciplines sit side-by-side, in which philosophers drink tea with students of medicine, poets and physicists juggle with the lyrical aspects of the quantum world and scholars of medieval literature work with computer scientists to decode manuscripts...or is it?

Is there a gap between what is and what could be? Can we, dare we, bridge it? What stops us from fulfilling our most imaginative conceptions of what it is to be a student, what it is to be an academic? You tell me, or better still tell us all by chatting, arguing, popping ideas onto the conference suggestion board and taking over the foyer and meeting rooms, the steps and the restaurant.




Go for it!

Section 2

Symposium Programme

Please note, the main keynote presentations will be recorded and some additional footage (video and still photographs) may also be taken at the event. If you have any concerns regarding this, please contact the event co-ordinator, Michelle Tooher, michelle.tooher@nuigalway.ie.

The keynotes will be summarised live by our visual scribe, Andrew Park of Cognitive Media.

Thursday June 10 th 2010		
Time	Session	Venue
08.30 – 09.15	Registration & Tea/Coffee	Foyer, Áras Moyola Building
09.15 – 09.30	Symposium Welcome and Opening Address, President NUI Galway	Theatre – MY001
09.30 – 10.15	Keynote I Prof Anna Craft <i>Creativity in Education: Learning in a Digital Age</i> <small>p.18</small>	Theatre – MY001
10.15 – 11.00	Keynote II Prof Norman Jackson <i>Developing Creativity through Life-Wide Education</i> <small>p.19</small>	Theatre – MY001
11.00 – 11.15	Tea/Coffee	Foyer, Áras Moyola Building
11.15 – 12.45	Parallel Session (A) 	Various
12.45 – 14.00	Lunch	Friars' Restaurant
14.00 – 14.45	Keynote III Prof Timothy Emlyn Jones <i>Creative Difference: Becoming Different and Making a Difference</i> <small>p.20</small>	Theatre – MY001
14.45 – 16.15	Parallel Session (B) 	Various
16.15 – 16.30	Tea/Coffee	Foyer, Áras Moyola Building
16.30 – 17.15	Keynote IV Prof Keith Sawyer <i>The Challenges of Creative Teaching and Learning</i> <small>p.21</small>	Theatre – MY001
19.30	Symposium Dinner (see p. 39)	Radisson Hotel, Galway
Friday June 11 th 2010		
Time	Session	Venue
09.00 – 09.30	Tea/Coffee	Foyer, Áras Moyola Building
09.30 – 10.15	Keynote V Anna Newell <i>Doctors can Dance</i> <small>p.22</small>	Theatre – MY001
10.15 – 11.30	Parallel Session (C) 	Various
11.30 – 11.45	Tea/Coffee	Foyer, Áras Moyola Building
11.45 – 12.30	Keynote VI Prof Finbarr Bradley <i>Culture as a Critical Ingredient in Innovation</i> <small>p.23</small>	Theatre – MY001
12.30	Lunch and Symposium Close	College Bar

Please Note: This Programme is subject to change.

Parallel Sessions

There are a number of themes which will be explored in sessions taking place in parallel during Thursday and Friday.

The workshop themes include

- Re-imagining the University;
- Pecha Kucha;
- Teaching Innovations – in practice;
- Voice and Creativity;

among others. Further details are listed below.

It is essential that you register in advance for workshops as numbers will be strictly limited to 30 people per workshop.

Parallel Session (A)

Thursday June 10th

11.15 – 12.45



The Creative Researcher p.8 Kevin Byron	MY 123
The Sound of Violets?: Creating Alternatives to Military Metaphors in Education p. 8 Lesley Saunders	MY 124
Re-imagining the University I p. 9 Paper session	MY 125
Creative Media in Action p. 10	MY 127
Teaching Innovations – in practice I p. 10 Presentation and panel discussion	MY 126
Voice and Creativity I: Finding Your Voice p.11 Max Hafler	MY 129
Unconference p.15	MY 232

Parallel Session (B)

Thursday June 10th

14.45 – 16.15



Teaching Innovations – in practice II <small>p.9</small> Presentations and panel discussion	MY 123
Re-imagining the University II <small>p. 9</small> Prof. Sarah Moore & Kelly Coate	MY 124
Using story, poetry and drawing for reflection <small>p. 12</small> Dorothy Morrissey, Sinead Hahessy, Hazel Messenger	MY125
A Bit of an Adventure <small>p. 14</small> Anna Newell	MY 127
Pecha Kucha I <small>p. 15</small> 20 slides, 20 seconds, 9 speakers	MY 126
Services Innovation: Example in Practice <small>p. 14</small> Prof. Finbarr Bradley	MY 232
Creative Technology for Teaching <small>p. 14</small>	MY 129
Unconference <small>p.15</small>	Foyer

Parallel Session (C)

Friday June 11th

10.15 – 11.30



The Creative Researcher <small>p. 8</small> Kevin Byron	MY 123
Life-wide Creativity Norman Jackson	MY 124
Re-imagining the University III: Elevator pitches <small>p.9</small> Kelly Coate & Aurelie Boulos	MY 125
Teaching Innovations – in practice III <small>p.10</small> Presentations and panel discussion	MY 127
Voice and Creativity II: Using the Material <small>p.11</small> Max Hafler	MY 129
Pecha Kucha II <small>p16</small> 20 slides, 20 seconds, 8 speakers	MY 126
Unconference <small>p.15</small>	MY 232

Workshops

The Creative Researcher

Parallel Session (A+C)

Facilitator: Kevin Byron

When the rocket scientist Wernher von Braun described research as: "What I'm doing when I don't know what I'm doing" he was referring to the idea that progress in research is discontinuous and unpredictable. It is rarely presented that way however in published research reviews where there is a tendency towards a linear description in the development of ideas. On a more personal note the feeling expressed in the retort 'Why didn't I think of that ?' on hearing about a new idea in our own field of research, would add further support to a general belief that new ideas are predictable and indeed obvious.

In opposition to this view, exemplified by von Braun's experience, is the view that creativity is much more than the sum of one's knowledge and a rather haphazard process in which one is, most of the time, unsure about where it is all going.

In this workshop these two views of research will be explored in the context of how ideas evolve. They will be shown to be referring to different stages in the development of research projects. The workshop will be an opportunity to practice some of the tools and techniques that could help the researcher 'know what they are doing, when they don't know what they are doing'.

The Sound of Violets? Creating Alternatives to Military Metaphors in Education

Parallel Session A

Dr Lesley Saunders, Visiting Professor, Institute of Education, London; Research Fellow, Oxford University Department of Education; poet.

This workshop - whose shaping ideas come from a paper co-authored last year with Professor Alison Phipps, University of Glasgow - will begin with a presentation on how 'creativity' in education has been expropriated and attenuated in the service of a particular policy agenda.

Participants will then be guided through a personal creative writing exercise to discover alternative metaphors in which to express their core educational values.

Re-imagining the University

Parallel Session (A)

Paper Session

The incompleteness of imagination: creativity constraint and enablement within disciplinary context.

Aurelie Boulos, David Rock (NUI Galway) p. 33

Rage Against the Machine: Pearse, Managerialism and the Re-imagined University

Richard Hayes (WIT) p. 33

Tales from a Troubled Archipelago: leadership, agency and change in the 21st century university

Conor Galvin (UCD) p. 34

Parallel Session (B)

Discussion Session

Prof. Sarah Moore & Dr. Kelly Coate

This workshop will take the format of a discussion session facilitated by Sarah Moore (Dean of the Centre for Teaching and Learning, University of Limerick) and Kelly Coate (Lecturer in Teaching and Learning in Higher Education, NUIG). The focus will be on 're-imagining the university', and Sarah and Kelly will begin the discussion by reflecting on contemporary issues in teaching and learning in universities in Ireland. What are some of the key issues in relation to academic development, the student experience, and pedagogical approaches? What sorts of changes and scenarios might we imagine for the future? We will invite the audience to help us explore teaching and learning within the re-imagined university.

Parallel Session (C)

Elevator Pitches

This workshop will consist of several 'elevator' (or 'lift') pitches on the theme of the re-imagined university. The contributions will be a quick, 5-minute 'pitch' of the presenter's vision for universities of the future. We will then open the session up to general discussion.

Creative Media in Action

Parallel Session (A)

Facilitators: Fiona Concannon, Paul Gormley, Gráinne McGrath

Marcus Bishop (Maths)	Learning Math: Illustrated Lessons Using Video
Marie Mahon (Geography)	Student Generated Videos for Learning
Aideen Gallagher (Occupational Therapy)	The Hoist Prescription Workshop goes Digital
John Morrissey (Geography)	Experiences of Podcasting for Undergraduate Students
Bonnie Long (Education)	Digital Storytelling with Postgraduate Diploma in Education Students

Teaching Innovations: in Practice

Three workshop sessions will showcase innovations employed in teaching by academics from a wide range of disciplines. Abstracts are available in pages 24 – 33.

Teaching Innovations: in practice I

Parallel Session (A)

Martin Hughes	(NUI Galway)	p.24
Yvonne Finn	(NUI Galway)	p.25
Edel Moore	(University of Leeds)	p.26
Natasha Mayo	(UWIC)	p.27

Teaching Innovations: in practice II

Parallel Session (B)

Eilís Ward	(NUI Galway)	p.28
Ruth Matheson	(UWIC)	p.29
Anne O'Connor	(NUI Galway)	p.30

Teaching Innovations: in practice III

Parallel Session (C)

Dorothy Ní Uigín et al.	(NUI Galway)	p.30
Stephen Wilkinson	(Leeds Metropolitan University)	p.31
Áine Furlong	(WIT)	p.31
Rita Smith	(NUI Galway)	p.32

Voice & Creativity

Facilitator: Max Hafler

These workshops will focus primarily on voice work and communication. You will explore how to use your voice more safely and dynamically, develop your delivery and make you more effective at getting your ideas across.

The workshops will also explore looking at the words that convey meaning, pitch and modulation, working with breathing, developing charisma, and working at reading from sight. Working on all these skills can save your energy and often help you through less motivated periods.

Finding Your Voice

Parallel Session (A)

This workshop will work primarily on finding and using your voice safely, projection, modulation, diction, clarity.

Using the Material

Parallel Session (C)

We will work specifically on emphasis. On the words which carry intention and meaning, on variation of tone and pace on written work and on pieces of your lecture.

It is recommended you attend both workshops as skills developed in 'Finding Your Voice' (A) are required for 'Using the Material' (C).

Please come in comfortable clothes. Though the subject is serious, the workshop will be relaxed and fun.

Please bring a text book from your course, and a page of notes from a lecture, if you use them.

About Max:

The course facilitator, Max Hafler, is an experienced voice and theatre technique teacher and director, who teaches in universities himself and is familiar with the ambience and demands of university work. In addition to regular work at NUI Galway in theatre and voice on their MA and BA Connect programmes, Max has worked at Boston MIT, and teaches voice regularly at Galway Youth Theatre. He has for several years run guest workshops in voice for the National Association of Youth Drama for facilitators and students alike. He has just returned from teaching a course to teachers in Switzerland hosted by the University of Bern.

He also works as a professional theatre director and is an award-winning playwright.

Using story, poetry and drawing for reflection

Presentation and Panel Discussion

Parallel Session (B)

Panel: Dorothy Morrissey, Sinead Hahessy, Hazel Messenger

Engaging with poetry, film and writing as creative processes of inquiry into the identity of the adult educator

Dorothy Morrissey, Mary Immaculate College, University of Limerick

This paper presents the story of my engagement – as an educator of adult education students on a one-year graduate diploma in adult education – with poetry, film and reflective writing to inform self-study or self inquiry. Self-study in its broadest sense combines the social construction of knowledge with reflective practice and action for social transformation. It is associated with ideas about the development of knowledge through the development of self-awareness and with resulting possibilities for the transformation of personal/professional self-identity and practice.

The paper details how poetry and film provided opportunities for imaginative engagement which, according to philosopher Maxine Greene (2001, p.30), promotes 'sympathetic feeling', or empathy, in ways that reliance on theoretical approaches alone may not. It demonstrates how the fictional lens provided by poems and films functioned as a distancing device that enabled the taken for granted to be more easily interrogated. The fictional lens also created a safe enough space for students to articulate and confront their own emotions, uncertainties and vulnerabilities. The paper describes how engagement with poetry and film was combined with students' own reflective writing as well as with theoretical and practical approaches to teaching and learning in adult education. Engagement with such competing discourses enabled students to understand teaching and learning, education, adult education and the education of adult educators as dynamic processes embedded in networks of power, many of which have become naturalised or mythologised. It also provided a space in which creative critical inquiry was valued as students were enabled to notice deeply, make connections, ask questions, and create meanings which should inform their future actions as adult educators.

The story told in this paper is contextualised with reference to my own critical reflections on the course, to reflective writing undertaken by the students as well as to relevant literature on reflective writing, arts based educational research, teaching and learning and creativity.

... session abstracts continued on page 12

Drawing out ideas: using a visual journal to aid knowledge creation in educational research

Hazel Messenger, University of Hertfordshire

Making sense of the complex range of information gathered during the process of undertaking research may be limited by the medium that is used by the researcher. Reflective diaries and logs tend to be text based or recorded and are organised as text blocks and sentences. These methods do not necessarily provide an adequate means for representing rich networks and patterns of thinking as they develop. Drawing provides a way of linking cognitive and emotional elements of thinking, creating rich, multidimensional records which complement other methods of recording such as writing and speaking.

Using a visual journal to support educational research is providing a useful methodological tool, and the process involved in its development creative, engaging and pleasurable. Developing familiarity and confidence with techniques used in art and graphic design is helping to draw out the ideas involved in a research project investigating the dispositions of teachers in higher education who are involved in the development of transformative learning cultures. Ideas associated with visual thinking and research as an embodied process support discussions relating to the usefulness of a visual journal.

SO YOU THINK YOU CAN WRITE? Using Poetry to Develop Critical Thinking & Meaningful Reflective Practice In Higher Education.

Sinead Hahessy, School of Nursing & Midwifery, NUI Galway.

Graham Carr, Faculty of Health and Social Care, London South Bank University, UK.

The aim of this presentation is to introduce participants to the use of poetry as a means of developing critical thinking skills and meaningful reflective accounts in educational settings. WH Auden once proposed that poetry might be considered a game of knowledge, a bringing to consciousness of emotions and their hidden relationships.

Do teachers really consider the emotions involved in writing? What do we really expect students to engage in when we ask for more critical insight and more reflection? In education, reflection is used as a description of how we see our environment, with the emphasis being placed upon our subjective experience.

The crucial aspects that distinguish reflection from analysis of other kinds of problem-solving is that it involves the self and should lead to a changed perspective. Reflection and reflective practice are both a learning strategy and a means of promoting professional practice.

Because writing is a creative act, it can function as a form of reflective practice enabling us not only to recount but understand our knowledge, in essence we construct it as we write, so that it is not until it is written, do we actually know what we knew. We learn from presenting our own learning in writing. The writing/editing process creates an intellectual space and sense of ownership. We also learn from the presentation (writings) of others.

Using poetry as a pedagogical tool can stimulate critical thinking and reflective writing. It can encourage creativity in word and language play. It can stimulate imagination and develops a sense of rhythm and sound. It has the potential to extend vocabulary. It is also a form of problem-solving as it draws upon varied intelligence such as thinking, feeling, listening, and experiencing and can facilitate many learning styles.

Services Innovation: Example in Practice

Parallel Session (B)

Facilitator: Prof. Finbarr Bradley

The world is undergoing a fundamental shift from the industrial age of physical goods to the innovation age of intangible services. Innovation in services is founded on an interdisciplinary approach to creating value. This Workshop will describe and discuss the theoretical context and practical implementation of an innovation programme currently run by the presenter in companies like PayPal and Bank of America Merrill Lynch. The emphasis in these is on the application of knowledge, codified and tacit, teamwork and practical learning driven by self-discovery and exploration. Meaning, emotions and culture feature prominently in a learning community built around conversation and relationships. Participants identify and initiate innovative ventures and illustrate through a team project how they propose to create value for their organisation. The Workshop discuss what this approach might imply for the development of programmes on creativity and innovation in today's university.

A Bit of an Adventure

Parallel Session (B)

Facilitator: Anna Newell

In 2006, we set up a brand new interdisciplinary arts MA experience at Queen's University, Belfast. At its core is a unique new module called "Adventures in Interdisciplinarity" and its sister module "Further Adventures in Interdisciplinarity" - new language for a new pedagogy.

What this model for the MA is about is creating an adventure playground where learning can happen in a broad range of ways – some of them not necessarily predictable.

Half of this session will chart the journey of the dreaming up of this pedagogy and show images and feedback from its happening. The other half will be an interactive session to explore inventing more Adventures for the future.....

Creative Technology for Learning

Parallel Session (B)

Andrew Flaus (Biochemistry) "Clickers In Action: Personal Response Systems for the Busy Lecturer."

Mary Dempsey (Mechanical and Biomedical Engineering) "Wacky Wikis: Thinking Outside the Box in Operations Strategy"

Brian Coll (IT Sligo) "From Chalk and Talk to Online Lectures – using Adobe Connect. "

Mary Fleming (Education) "Using Online Meeting Rooms to Support Post Grad Distributed Clinician Students"

Martin Hughes (Accountancy & Finance) Engaging students with technology

Unconference

Parallel Session (A, B, C)

In this self-organised discussion we encourage conference participants to take time to meet with others, share ideas and discuss some of the underlying themes of the Symposium. To help facilitate this we will set aside a room (in addition to the foyer space and seating throughout the building, which you are also welcome to use) in which you can gather, introduce yourselves to each other, find seats and cluster into groups or pairs. The conference pack will contain some thought-provoking questions or statements which can frame the discussions and we'd ask you in your groups to jot down some of the main responses to the questions or other comments. These can then be posted on the Ideas Board in the main foyer. Go on – give it a try!!

Pecha Kucha

Pecha Kucha I

Parallel Session (B)

Presenter	Title
Kevin Byron Queen Mary, University of London	Counter-Intuition
Maria Gallo St. Angela's College, Sligo	Engaging alumni in teaching and learning
Christa De Brun WIT	English literature to foster critical thinking
Imogen Bertin UCC	Designing Research Posters
Noelle Higgins DCU	Bringing the Class to Court: Active Learning in the Law Classroom
Oisín Keely NUI Galway	Video in Biochemistry teaching and learning
Rachel Quinlan NUI Galway	Stellation
Siobhan Smyth NUI Galway	Social Networking: Pragmatics of Blogging
Rana Dajani Hashemite University, Jordan	Drama in Biology

Pecha Kucha II

Parallel Session (C)

Presenter	Title
James Derounian University of Gloucester, UK	At your service
Phil Askham Sheffield Hallam University	EBL and learner autonomy
Éamonn Ó Cofaigh NUI Galway	Language Learning through Ning
Nathan Quinlan NUI Galway	tbc
Niall MacUidhilin NUI Galway	Literacy Engagement in Minority Language Online Communities
Aoife Ní Mhuirí IT Tralee	An innovative approach to the Teaching of Anatomy of the Body
Ingrid Murphy UWIC	Studio Based Teaching in Ceramics
Aisling McCluskey NUI Galway	Infinity: the abyss

Section 3

Keynote Speakers

3.1 Prof. Anna Craft

University of Exeter and The Open University

Creativity in Education: Learning in a Digital Age

ABSTRACT

The early 21st century is characterised by rapid change. Permeating digital technology engages increasing numbers of children, young people and adults as consumers and also producers. In the shifting technological landscape, childhood and youth are changing. Connectivity around the clock, with a parallel existence in virtual space, is seamlessly integrated with actual lives. Young people are skilful collaborators, navigating digital gaming and social networking with ease, capably generating and manipulating content, experimenting with versions of their 'social face'. They are implicit, inherent and immersed consumers. They are possibility thinkers. This keynote theorises possibility thinking in a digital, marketized age, using two competing discourses: young people as vulnerable and at risk; or alternatively as capable and potent. The former perspective imbues anxiety about the digital revolution; the latter embraces it as exciting and enabling. As Universities seek to re-imagine themselves, neither is sufficient. Local and global challenge and change urgently demand our creative potential and wisdom, recognising three further key characteristics of changing childhood and youth: pluralities, playfulness, and participation. Drawing from work with schools, I will argue for co-creating with students, education futures through dialogue to nurture the 4 p's: plurality, playfulness, participation and possibilities.

BIOGRAPHICAL INFORMATION

Anna Craft is Professor of Education at the University of Exeter, and at The Open University. Until earlier this year she acted as Government Advisor on creative and cultural education with a small team of others. Her twin interests are creativity in education and learning futures. She has written and edited sixteen books, including *Creativity Across the Primary Curriculum* (Routledge, 2000), *Creativity in Education*, with Bob Jeffrey and Mike Leibling (Continuum, 2001), *Creativity and Early Years Education* (Continuum, 2002), *Creativity in Schools* (Routledge, 2005), *Creative Learning 3-11* with Teresa Cremin & Pam Burnard (Trentham, 2008), and *Creativity, Wisdom and Trusteeship* with Howard Gardner & Guy Claxton (Corwin Press, 2008). Her next book is due in September 2010 from Trentham and is entitled *Creativity and Education Futures*. Anna directs several development projects, including Dance Partners for Creativity (AHRC), Possibility Thinking, and Aspire (each with multiple funders). She has led many other studies on creativity and education futures. She is founding Co-Editor of Thinking Skills and Creativity and Co-Convenor of British Educational Research Association Special Interest Group, Creativity in Education. At Exeter she convenes the CREATE research group and co-convenes the Educational Futures research group

SELECTED PUBLICATIONS:

- CRAFT, A. (in press). *Creativity and Education Futures: Learning in a Digital Age*. Stoke-on-Trent: Trentham Books
- CRAFT, A., GARDNER, H., CLAXTON, G. et al (2008) *Creativity, Wisdom, and Trusteeship. Exploring the role of education* Thousand Oaks: Corwin Press
- CRAFT, A. (2005) *Creativity in schools: tensions and dilemmas*, Abingdon: Routledge



3.2 Prof. Norman Jackson

Centre for Excellence in Professional Training and Education, University of Surrey, England

norman.jackson@surrey.ac.uk

Developing Creativity through Life-Wide Education

ABSTRACT

The world needs people who can combine and integrate their knowledge, skills and capabilities in creative and adventurous ways to work with complexity, create wealth and prosperity and enrich enterprises, societies and cultures. The problem with higher education is that it pays far too little attention to students' creative development. Often taken for granted and subsumed within the cognitive skills that are traditionally valued, creativity as an outcome of a higher education is usually more by accident than design.



I believe that education that is dominated by the mastery of content and cognitive performance in abstract situations, while a necessary for the specialised critical thinking/problem solving capacities for a complex world – is not enough. To prepare students for the complexities of the world we need to pay much more attention to the development of students' capability for dealing with real world situations: capability that includes their creativity. Our will to be creative usually stems from a deep intrinsic motivation inspired by the personal choices we are able to make in our life. We talk a lot about student-centred learning but if we respected the learner as the designer of their own life experience we would have more chance of embracing, supporting and recognising their capability to deal with real world situations and the creative acts embodied in such capability.

My proposition is that we can move towards this situation by honouring students' creative spirit and encouraging them to fulfil their creative potential for dealing with situations in the real world, by adopting and practising a life-wide concept of higher education.

BIOGRAPHICAL INFORMATION

Norman is Professor of Higher Education and Director of the University of Surrey Centre for Excellence in Professional Training and Education (SCEPTrE). One of the aims of the Centre is to support students' development of capability for being an effective professional – an important aspect of which is their creative agency. Our vision of learning for a complex world has forced us to develop the idea of life-wide learning and life-wide education.

Prior to SCEPTrE Norman was a Senior Adviser in the Higher Education Academy and the Learning and Teaching Support Network Generic Centre where, in 2001 he initiated the imaginative curriculum network which helped develop new understandings of creativity in higher education and the ways in which students' creative development is supported and encouraged. Some of this work was published in a book by Routledge-Falmer, 'Developing Creativity in Higher Education: an imaginative curriculum.' During the 90's he worked as an HMI and held senior posts with the Higher Education Quality Council and Quality Assurance Agency, but he began his professional life as a geologist, a higher education teacher and researcher.

3.3 Prof. Timothy Emlyn Jones

Dean, Burren College of Art

Creative Difference: Becoming Different and Making a Difference

ABSTRACT

This presentation will discuss the principle of universal human creativity, the provenance of contemporary art, postmodernism, and the transferability of creative processes from fine art to non-artistic contexts. The Burren College of Art / NUI Galway module FA513, "Introduction to Creative Difference and Innovation" that has just completed its first iteration in the Executive MBA and that is also available in the Structured PhD will be taken as a case study, with inputs from the staff and students of the MBA.



BIOGRAPHICAL INFORMATION

Timothy Emlyn Jones is an artist who has exhibited internationally and who is represented in public collections in many countries. He held professorships at Wimbledon College of Art, London; University of Glasgow (Glasgow School of Art); and Xi'an Academy of Fine Arts, China before his taking up the positions of Dean of Burren College of Art, Ireland and Adjunct Professor of Art Education at NUI Galway.

CONTACT DETAILS:

Professor Timothy Emlyn Jones
Burren College of Art

Email: tejones@burrencollege.ie

3.4 Prof. Keith Sawyer

Washington University, St. Louis

The Challenges of Creative Teaching and Learning

In the 1980s, the cognitive revolution of the 1970s began to influence scholarship in two areas: creativity and learning. In creativity, this influence has resulted in the contemporary prominence of the "creative cognition" approach and the "sociocultural" approaches to creativity. These approaches have largely replaced an earlier emphasis on the personality traits of creative individuals. In learning, these lines of research have resulted in the learning sciences, an interdisciplinary field of research that emerged from a combination of cognitive, situated, and distributed views of learning.

My current project is an attempt to synergistically combine these two contemporary lines of research, with the goal of better understanding how to design learning environments that help learners be capable of more creative thinking and behavior. Toward this end, in Summer 2009 I conducted a one-month study of an innovative learning environment, the San Francisco Exploratorium. I use the Exploratorium as a case study to examine three characteristics that I argue must be true of all creative learning environments: (1) a shared cultural model of creative learning; (2) a process to create new learning environments; (3) a way to prepare creative teachers. I then identify several challenges that the Exploratorium has faced in developing these three characteristics, and I argue that all creative learning environments must address these challenges to successfully foster creativity in teaching and learning. The central message is that both creativity and learning necessarily balance two competing tensions: freedom and creativity on the one hand, and guiding structures, on the other.

BIOGRAPHICAL INFORMATION



Keith Sawyer is an Associate Professor of Education at Washington University, with additional appointments in the Department of Psychology and the School of Business. His research has focused on three related topics: collaborative creativity; group learning; and sociological theories concerning the relations between individuals and groups. He has written or edited ten books, including *Group Genius: The Creative Power Of Collaboration* (Basic Books, 2007), *Explaining Creativity* (Oxford, 2006), and *The Cambridge Handbook Of The Learning Sciences* (Cambridge, 2006). His next book is due out from Cambridge

University Press in 2011 and is titled *The Teaching Paradox: Creativity in the Classroom*. During the 2009-2010 academic year, he was on sabbatical leave from Washington University; he spent the fall as a Visiting Scholar at the University of Cambridge, and the spring as a Visiting Professor at the Savannah College of Art and Design, in Savannah, Georgia.

3.5 Ms. Anna Newell

Queen's University Belfast

Doctors Can Dance

Dead Man Talking: Using devised theatre to explore a topical issue in bioethics

ABSTRACT

Dead Man Talking was a cross faculty interprofessional initiative with the School of Medicine, Dentistry & Biomedical Sciences, Centre for Medical Education and the Centre for Excellence in the Creative and Performing Arts at Queen's University Belfast (QUB). An ethicist (Dr. Melissa McCullough) and a theatre director (the proposers of this workshop), facilitated this intensive performing arts project along with a freelance choreographer. The purpose was to allow medical and drama students to explore a predefined bioethics topic (body donation was chosen for the 2009 pilot), and use devised theatre techniques to aid the students in the development of a script that was then performed to the public over three nights in September 2009. An added challenge was that students had two weeks to complete this process and refine the performance.

BIOGRAPHICAL INFORMATION

Anna Newell is the Artistic Director of the Centre for Excellence in the Creative and Performing Arts (NI), an interdisciplinary arts programme at Queen's University Belfast. For the 16 years prior to coming into post at Queen's in 2005, Anna was a freelance theatre director, directing professional and community projects in Scotland and beyond. Formerly Associate Director, Dundee Rep, she recently directed *BRUISED* for Tinderbox Theatre Company and *A VAMIPRE STORY* and *BE MY BABY* for the Lyric Theatre, Belfast. She also has led large-scale women's community acapella harmony singing groups in Dundee and Belfast for the past 16 years, the latter of which is currently making a Concert For Babies for the Belfast International Children's Festival.



Melissa McCullough (Module Co-ordinator) was appointed as a Lecturer in Medical Education at Queen's University Belfast (QUB) in 2005. Having completed her PhD in 1996, Melissa held positions to senior management within the pharmaceutical and biotechnology industries before returning to academia. In 2005, Melissa completed an LLB Law at the University of London shortly after commencing her lecturing position. In 2006, Melissa completed her training in clinical ethics at Alden March Bioethics Institute, Albany Medical College, New York. As a member of the Centre for Medical Education, she is responsible for teaching and curriculum development of Medical Law and Ethics, directing the Patients as Partners simulated patient programme, coordinator of the Mater Hospital Interprofessional Education (IPE) project (2005-9) and the MSc Interprofessional Health & Social Care Management at QUB in collaboration with the Beeches Management Centre. Melissa is also a member of the School's Research Ethics Committee. Melissa is a visiting lecturer at the Royal College of Surgeons in Dublin and in April 2009 was appointed by the Minister for Health as a non-executive director to the Northern Ireland Health & Social Care Board. Melissa's research interests include comparative healthcare law & ethics, human rights & healthcare, resource allocation, organ donation, reproductive ethics among other areas of bioethics.

3.5 Prof. Finbarr Bradley

Culture as a Critical Ingredient in Innovation

ABSTRACT

In a globalised world, rootedness is often regarded as antithetical to creativity and innovation. However, a clear emerging paradox is that in a world of interlinked global markets, rapid transportation, and high-speed communications, location and culture are becoming more rather than less important. Meaning emerges from rootedness founded on memory and belonging. Far from representing dead artefacts that are anti-modern and non-economic, culture provides an ideal base for creativity and innovation. People grounded in their own culture appreciate diversity and the cultural values of others with whom they must co-operate. This helps generate an innovative mind frame. Ireland's innovative capabilities and self-reliance therefore depend on a strong cultural base. Culture, rooted in place and fostered by a forward-looking public policy, could lead to an Ireland self-reliant if not self-sufficient, utterly unique while eminently cosmopolitan, well positioned to compete in the turbulent global economy. Its implications for teaching and learning in the modern university will be discussed.



BIOGRAPHICAL INFORMATION

Finbarr is an educator who designs and manages university-accredited innovation programmes at companies like Merrill Lynch, Paypal, Omnipay, etc. He was a professor of finance at DCU heading up graduate programmes in the early days of the IFSC. He set up the Irish-medium centre Fiontar at DCU to foster a strong entrepreneurial spirit among students and which ran a degree in finance, computing and languages. He is a former chairman of zamano, a high tech start-up founded by Fiontar students, now publicly listed. He was a professor in the Economics Dept. at NUI Maynooth and the faculty member responsible for setting up the Innovation Value Institute (IVI) with Intel Ireland. He has been a visiting professor at UCD Smurfit School, University of Michigan, Fordham University and the Helsinki School of Economics. He has published in journals such as the Journal of Portfolio Management, The Irish Banking Review, Studies, Administration, Comhar, Feasta, Sustainable Development, Irish Educational Studies and The Irish Review. His 2008 book, Capitalising on Culture, Competing on Difference [Blackhall Publishing], co-authored with James Kennelly, on innovation, learning and sense of place in a globalising Ireland was launched by An Taoiseach Brian Cowen. He co-edited with Joe Mulholland a book of essays on Ireland's economic crisis from the 2009 MacGill Summer School. He has an engineering degree from UCC and a PhD from the Stern School of Business, New York University (NYU).

CONTACT DETAILS:

Professor Finbarr Bradley
mobile: 087-2835511
website: www.intinn.ie
email: finbarr.bradley@ucd.ie.

Section 4 | Papers

This section details the abstracts of presentations which will take place in paper strands – Re-imagining the University and Teaching Innovations and some posters that will be on display in the foyer throughout the event.

Executive Master of Business Administration (EMBA) Tribot Challenge

Martin Hughes
National University of Ireland, Galway
Email: martin.hughes@nuigalway.ie

The 'Tribot Challenge' was an innovative project simulation specifically designed to foster active engagement to enhance the student learning experience in a theoretical subject. The simulation consisted of a team challenge to build and program a robot while remaining on time and on budget. Teams of 3 were provided with a robotics kit, laptop, a budget and other resources and instructed to complete three tasks in an adequate but tight timescale. The learning outcomes related to strategy formulation and implementation in a hostile environment and included a focus on problem solving, teamwork, negotiation, prioritisation and budgeting. Some students later commented that it was one the best learning experiences that they have ever had in a formal academic environment.

Problem:

The 'Tribot challenge' was conducted as part of a strategy module on the EMBA in NUI Galway. Strategy modules, although integral to many masters' programmes, typically suffer from the difficulty of providing a real experience in the classroom. Common approaches to overcome this problem include the use of case studies and guest lectures but these activities, while useful, are at best a surrogate for real experience.

The Tribot challenge was a new innovative approach that provided a real, active learning experience within the classroom. It challenged students to formulate a strategy, manage time and budget constraints, work as a team and suffer the consequences of their own decisions and actions.

Presentation:

This presentation will outline the context and the motivation for undertaking this innovative approach. The plan, formulation and implementation of the challenge will be discussed. Also included will be short video of the project in action. The presentation will conclude with a discussion on the learning outcomes.

This challenge can be applied in many different contexts where different learning outcomes may be accentuated. The presentation may provide the seeds of innovation for similar ideas using different resource in a different environment. As such, it will be of interest and relevant to a diverse set of instructors in higher education.

Evaluating Educational Environments

Y Finn, G Avalos, G Flaherty, F Dunne
National University of Ireland, Galway
Email: yvonne.finn@nuigalway.ie

The Medical School at NUI Galway has introduced a new 5 year undergraduate curriculum which has a student-centered, systems-based approach with emphasis on integration, interactive learning and professionalism. We used the Dundee Ready Education Environment Measure (DREEM), a 50 item validated inventory, to measure the educational environment in the new curriculum and compare this to the educational environment in the old curriculum as measured in an earlier DREEM analysis.

Methods:

Students enrolled in the new curriculum were invited to electronically complete the anonymous DREEM inventory. Data analysis was carried out using SPSS 17.0 and the Student unpaired t-test.

Results:

The mean total score was 134 out of 200, compared with 130 in the old curriculum. This was significantly higher ($p=0.003$) indicating greater satisfaction with the educational environment in the new curriculum. Items identified as areas in need of improvement in the old curriculum remained of concern in the new curriculum including overemphasis on memorization of facts, issues with timetabling, lack of support for stressed students and inadequate provision of feedback.

In the new curriculum clinical students perceived their environment more positively than in the old curriculum ($p=0.008$); they perceived teaching as being less teacher centred and satisfaction with development of their problem-solving skills increased. Preclinical students in the new curriculum had greater academic self-perceptions, felt more confident about passing exams and better prepared for clinical practice.

In the new curriculum male students were happier with the atmosphere and their teachers than females ($p\leq 0.05$) and were more confident about asking questions and passing the year. Females were more self-assured in their learning strategies than males.

In the new curriculum Irish and non-Irish students perceived the environment similarly in each of the subscales. This compares to the old curriculum where the non-Irish group viewed the atmosphere more negatively, with a significantly lower score in perceptions of atmosphere.

Conclusions: A change to a systems-based curriculum has increased satisfaction levels among medical students with their educational environment. The DREEM inventory is a useful tool for evaluating the educational environment, providing feedback to curriculum development committees, and identifying problem areas in need of enhancement.

Integrating creativity and innovation into pedagogical practice – business and design collaborations that cross discipline boundaries

Edel Moore
School of Design, University of Leeds
Email: e.m.moore@leeds.ac.uk

The need for education to facilitate and nurture creative and innovation skills among graduates is not new, especially within the areas of business and design. However, the importance of these skills and in particular their application to economic outputs at individual, organisational and national levels has seen renewed interest from political and academic experts alike. As a result, design and business faculties and those teaching within them are facing increasing pressures to engage with and develop appropriate pedagogical practices. This paper discusses the outcomes of an Academy of Marketing funded project which collated current thought and evidence-based case studies from subject and teaching experts in the UK and America. The project specifically looked to collaborative teaching models that highlighted best “different” practice. Underpinning the need for research into best ‘different’ practice is Phillips’(1981) definition of educational innovation as “a practice which is worthy of emulation and has not yet been put into use by a significant number of colleges.” The project specifically looked to learning, teaching, assessment and environ practices that aided the integration of creative input with innovative outcomes. The presentation highlights current thought and evidence-based case studies from subject and teaching experts in the UK and America. The findings of five interdisciplinary, multidisciplinary and trans-disciplinary design and business collaborative teaching models are discussed. It looks to design expertise from arts, graphics, engineering and sciences and business expertise from advertising, marketing and entrepreneurship. As the project dealt with the development of ‘different’ practice two studies are video based.

As traditional discipline boundaries become more porous, new educational liaisons are emerging. Today, both design and business skills are increasingly recognised as being significant across many disciplines and central to societal wellbeing. If educational institutions are to successfully develop creative and innovative thinking among their graduates then it becomes our challenge to utilise these same skills to develop the most appropriate teaching pedagogies possible.

Making the Creative Process Visible

Natasha Mayo
University of Wales Institute
Email: nmayo@uwic.ac.uk

Making the Creative Process Visible is an interactive web-based teaching resource that seeks to encourage understanding of potential relationships between skills, processes and ideas. Its approach is holistic, at the same time exposing students to technical possibilities, building knowledge and confidence, and exploring the potential of this knowledge in the negotiation of ideas.

The basic premise is a simple assertion: that there are fundamental structures that enable the development of ideas and underpin most theoretical and subject related concerns. These structures are developed from an understanding of creative thinking which, according to Spearman's psychological model, is essentially the ability to see or create relationships between things. In art, this is often characterised by the necessary shift we undergo when understanding inanimate properties of form and texture as having the capacity to connect with sensation and emotion. In the development of ideas, as we consider changing aesthetic attributes, moving properties, altering scale, in all such mental thrusts we are 'educing correlates', finding and refining connections. When two properties are brought into relation, others arise and the process of invention unfolds, the resource utilizes this activity.

The main site hosts a skill-based archive and a series of case studies exploring tendencies and patterns in the ways ideas are developed. Affiliated to this, is a social network of student-led accounts, similarly configured to document the skills and developmental strategies in individual practice.

The skill-based archive consists of a series of short films demonstrating core ceramic processes. These skills are also hyperlinked to examples of current practitioners and an established glaze and technical database. The case studies refer directly to this archive. They take the form of interviews and video of students' work across a range of projects demonstrating the role and interconnectivity of initial stimulus, influences, drawing and skills.

The interlinking skill base and creative strategies enables a user to experience forging connections themselves. Investigation and enquiry are thereby central to learning, particularly as students contribute their own thought processes via the social network. Potentially working from BA through to PhD level, the resource encourages a culture of inherited knowledge, an archived community of creative thinking.

Contemplation in Third Level Education: Taking The Backward Step

Eilís Ward

National University of Ireland, Galway

Email: eilis.ward@nuigalway.ie

This paper addresses the centuries-old western epistemological tradition which privileges knowledge as mastery, objectification and control through considering an 'experimental' contemplative approach to education. It draws on my experience in teaching a new subject area (Third Year BA option course: Buddhism, Politics Society) in the School of Political Science and Sociology, NUIG. This course was first taught in Semester Two 2009/10 as an optional seminar.

The content of this course required students to take what, in the Zen tradition, is called 'the backward step' (pausing, stepping backwards, contemplating), included some formal contemplative content and sought to posit not-knowing as a positive epistemological stance. It encouraged questioning over answers and through its exploration of Buddhist ontology, it sought to bring the body back into the classroom as a place of learning. It encouraged students to develop their own 'learning path' through the topic and sought to constitute the classroom as a scholarly 'sangha' (or community) for the duration. The approach not just required a different approach for the students but also a different approach to teaching.

The rationale for the course approach was inspired by, amongst other factors, the work of US based Centre for Contemplative Mind in Society (www.contemplativemind.org) and was informed by personal experiences of the challenge in facilitating student's critical engagement with subjects, literatures, ideas as opposed to processing 'information'. It is located in a world in which while we now have access to extraordinary learning tools (such as the World Wide Web) and vast amounts of information, we seem to be losing the 'time to think' (Levy, 2007). The paper will draw on research on the experience of attempts to integrate contemplative approaches into higher education (Shapiro, Brown & Astin, 2008).

References

- Levy, David (2007). "No time to think: Reflections on information technology and contemplative scholarship" in *Ethics and Information Technology*, Vol 9: 237-249.
- Shapiro, Shauna, Brown, Kirk Warren & Astin, John (2008). *Towards the Integration of Meditation into Higher Education: A Review of Research*, paper prepared for the CCMS. Available at www.contemplativemind.org.

Exploring the relationship between PBL and Creativity

Ruth Matheson, J. Riley
University of Wales Institute
Email: rmatheson@uwic.ac.uk

Today's graduates need to be prepared to meet the challenges of change and diversity in the work place through an ability to solve problems and offer innovative solutions to complex situations. Research into the theory of creativity highlighted a strong link between the attributes of the creative person with the 'ability to adapt to almost any situation' (Csikszentmihalyi 1996:50) and those developed by problem-based learning (PBL) students who can engage in the 'complexity and diversity of everyday problem situations' (Savin-Baden 2000:26). Barrows (1986) suggest that PBL enhances the development of clinical reasoning, promotes self-directedness, increases motivation to learn and assists students in developing skills to structure and use knowledge in clinical contexts. Cardiff University's Occupational Therapy Department, utilizes PBL in the development of creative reflective therapists, able to adapt to changing demands. This paper explores the links between creativity and problem-based learning from the findings of a qualitative, longitudinal study of 68 students over two years, highlighting aspects of the curriculum that enhanced or inhibited creative thinking and subsequent innovative practice.

Evaluation of the students' perceptions offered the following aspects of curriculum design and implementation as key to the development of creativity:

- Tutor facilitation that encouraged lateral thinking, questioning, challenged ideas and promoted deeper thinking
- An environment that allowed for free thinking, openness and trust
- The use of experiential learning to enrich the PBL experience and promote an understanding of self
- Triggers that emphasised creative lateral thinking rather than knowledge acquisition
- Constructive feedback

Inhibiting factors included:

- Time for independent research and incubation of ideas
- The environment and resources
- Strategic learning

Within PBL curricula there is opportunity for flexibility enabling us to be creative educators, providing resources and environments that promote discovery whilst offering support and mentorship.

References:

- Barrows, H.S (1986) A Taxonomy of Problem-Based Learning Methods. *Medical Education* 20, 481-6
- Csikszentmihalyi, M (1996) *Creativity: Flow and the Psychology of Discovery and Invention* (1st Ed) New York NY: Harper Collins.
- Savin- Baden, M (2000) *Problem-Based Learning in Higher Education: Untold Stories* Buckingham: The Society for Research into Higher Education and Open University Press.

Playing to Learn/Learning to Play: the place of games in third level language teaching

Anne O'Connor

National University of Ireland, Galway

Email: anne.oconnor@nuigalway.ie

The advantages behind using games as a language teaching pedagogy have been discussed and supported in studies such as Lee (1979), Wright et al. (1984) and Caon and Rutka (2004). Despite this, language games have generally been targeted at younger rather than older learners and they are used haphazardly and irregularly at third level. This paper aims to make the case for the inclusion of language learning games in Higher Education arguing that they should be seen as a highly effective teaching methodology which can greatly enhance learning outcomes. I will show how language learning games can help students to sustain the effort of learning and encourage students to interact and communicate. Having established the rationale behind the use of games, the paper will then examine the reasons why language lecturers at third level often do not use games and also the opinions of third level students on the appropriateness of games in their curriculum. The data collected from surveys conducted in NUI Galway will be shown, and the barriers restricting the use of games in Higher Education discussed. These discussions will demonstrate that games are an underused and yet successful way to learn a language, particularly at third level.

The Irish Language in Medical Settings

Gerard Flaherty, Máirtín Ó Maoláin, Dorothy Ní Uigín

National University of Ireland, Galway

Email: dorothy.niugin@oegaillimh.ie

When a doctor is determining the likely cause of a patient's presenting complaint on their first meeting, it is estimated that 10% of diagnostic certainty is dependent on the physical examination, 10% on investigations and 80% on the patient history. It is logical to assume then, that history-taking is best carried out in the patient's native language or language of choice. In this paper, three presenters, a medical student, an Irish language academic and a physician will discuss their research and experiences involving medical students and healthcare personnel and their attitudes towards, and experiences of the Irish language. It will focus in particular on research carried out during the summer of 2009 regarding students' and healthcare practitioners' attitudes to the Irish language and will conclude with a description and evaluation of a novel Special Study Module for medical students in the second semester of year two – Teanga an Leighis – that aims to assist medical students in developing a level of fluency in Irish that would enable them to confidently take a patient's history and communicate with them and their relatives through the medium of the Irish language.

Animation Club

Stephen Wilkinson
Faculty of INN, Leeds Metropolitan University
Email: s.wilkinson@leedsmet.ac.uk

There are many challenges facing the assessment teaching and learning of Animation Technology subjects which combine the application of creativity through digital technology. This is set against the backcloth of large cohorts of students on a number of different course from Music and New Media to Games Design, with a diversity of needs. These needs include the wish to develop either 2D cell or 3D computer animation using a variety of professional software. The assessment is based around a competition called the 11 second club which has an eleven second audio clip from an old movie as its starting point. The basis for learning is through this initial problem and the production pipeline they then follow which gives authenticity to the experience. Activities within the pipeline include an online test that points the students at the material and support available with exemplar work as a feature. Then an animatic as an interim assessment point was used, with the final assignment being uploaded to the Universities formal VLE. Due to the popularity of social networks and the lack of activity on formal VLE discussion boards, an informal social network called the "Animation Club" was formed using a NING. This enabled students to upload their work as it progressed and share help and information with each other, they also became co-creators of learning material in this way. Other facilities within the Animation club included RSS feeds to podcasts and the formation of interest groups. The students felt they had some control of this area. This paper presents how both formal and informal learning communities can be used to handle large cohorts with a diversity of abilities and needs and how creativity can still be encouraged through the application of digital technology and Web 2.0 tools.

Exploring 'in-between' spaces to foster creative thinking in Higher Education: the case of plurilingualism/culturalism

Áine Furlong
Waterford Institute of Technology
Email: afurlong@wit.ie

First, this paper proposes to show how awareness of 'in-between' spaces in our personal, social and professional lives reveals the existence of dynamic and creative 'in-between' spaces (Bhabha 1994). Second, on foot of claims that high-level plurilinguals as a group do better than corresponding monolinguals on tests measuring ... creativity, divergent thinking, cognitive flexibility (Skuttnab-Kangas 2002), we will explore how and why plurilinguals are more likely to consider in-between spaces as potentially fertile terrain for creative expression. Third, concrete examples of the use of such spaces in the context of Higher Education will be presented. These examples include the use of physical spaces, course development, teaching approaches and new forms of assessment in the domain of language learning and teaching. In conclusion, by showing the relation of creative thinking to plurilingualism, it is hoped that new arguments for language learning will emerge.

Peer Assessment in Nursing

Eimear Burke, Dr Dympna Casey, Catherine Houghton, Lorraine Mee, Rita Smith, Deirdre Vanderputten & Hilary Bradley
NUI Galway
Email: rita.smith@nuigalway.ie

Peer assessment was introduced in September 2009 to the Bachelor of Nursing Science (General) and the Bachelor of Midwifery Science Programmes in the School of Nursing & Midwifery NUI Galway. The focus of this innovative approach to the student learning experience was to encourage students to become critical independent thinkers, able to judge their own work as well as that of their colleagues and to enhance student learning.

Peer assessment is being used increasingly in education to allow students to become involved in their learning and its evaluation, to understand what is expected of them and to enhance student engagement (Race 2001). With an increasing emphasis on student-centred learning, interest is growing in the use of peer assessment (Elliot and Higgins, 2005). The structuring of assessment has a major effect on how students learn; the integration of peer assessment into the learning process can enhance learning (Cooke & Alavi 1995).

This study explored second year undergraduate nursing and midwifery student's perspectives and experiences of completing peer assessment. Students completed a peer assessment exercise on a written assignment in a health promotion module. Following this they were invited to participate in focus group interviews to discuss their experiences of the process.

A qualitative interpretive descriptive design (Thorne et al., 2004) was used and data were analysed using the constant comparative method of analysis.

The purpose of this presentation is to discuss the preliminary findings from this research. Students' perspectives of peer assessment will be presented with a focus on any differences in the experience between the general nursing and midwifery students. Areas that worked well or alternatively areas that require improvement when conducting a peer assessment initiative will be discussed.

Recommendations from this research will provide guidance for the further development and improvement of the peer assessment process and contribute to the educational literature on teaching, assessment and engagement approaches for undergraduate students. The findings can also assist in the development of an information resource on peer assessment for students and staff.

References:

- Cooke M & Alavi C. (1995) Approaching Problem Based learning in Problem Based Learning in a Health Sciences Curriculum . Alavi C. (Ed) Routledge, London.
- Elliot N & Higgins A. (2005) Self and peer Assessment - does it make a difference to student group work? Nurse Education in Practice 5, 40-48.
- Race P. (2001) The Lecturers Toolkit 2nd edn. Kogan Page, London.
- Thorne, S, Reimer Kirkham, S. & O'Flynn-Magee K. (2004) The Analytic Challenge in Interpretive Description. International Journal of Qualitative Methods 3 (1). (Accessed Feb 12th 2010 from http://www.ualberta.ca/~iiqm/backissues/3_1/pdf/thorneetal.pdf)

Rage Against the Machine: Pearse, Managerialism and the Re-imagined University

Richard Hayes
Waterford IT

"The modern child is coming to regard his teacher as an official paid by the State to render him certain services; services of which it is in his interest to avail of, since by doing so he will increase his earning capacity later on; but services the rendering and acceptance of which no more imply a sacred relationship than do the rendering and acceptance of the services of a dentist." So wrote Padraic Pearse in his famous pamphlet, *The Murder Machine*.

This brief paper views current trends in thinking in Higher Education in Ireland through the lens of Pearse's polemic. The paper takes seriously Pearse's use of phrases like "sacred relationship" and makes some proposals about a re-imagined university that take something from Pearse's formulation of the purpose of education. Specifically, the paper offers Pearse's ideas and imagination (and indeed his example) as an antidote to the movement towards managerialism in Higher Education in Ireland and the language associated with it.

The incompleteness of imagination: creativity constraint and enablement within disciplinary context

Aurelie Boulos, David Rock
NUI Galway

Academic disciplinary structures are mainly perceived as a constraint on creativity in terms of learning and teaching experiences within Higher Education. Yet, academic disciplines are always themselves products of specific disciplinary communities' imaginaries, meaning shared, constructed horizons of meaning, which set the terms of the (im)possible and (im)permissible within a discipline. In fact, constraint and enablement are always two sides of the same coin (Giddens, 1984), as we need to have some attempted closure of meaning in order to have any framework for communication and creation in the first place (e.g Giddens, 1984 ; Foucault, 1990, 1994 ; Laclau and Mouffe, 2001). Hence, when it comes to challenging the phenomenon of constraints generated by the disciplinary structure, a real shift in the academic disciplinary imaginary has to take place in order to open greater space for creativity. This entails a recognition of the constructed nature of academic boundary constraints, of agents' own role in the structuration of such, and of how the impossibility of closure, and the multiplicity of available perspectives and paradigms, can lead to greater flexibility and creativity for teachers and students both.

The authors will employ a variety of theoretical perspectives in order to shed speculative light on the paradox of imagination within the "social imaginary" as a medium of both of constraint and enablement, through re-imagination, in terms of creativity within the academic disciplinary context.

Tales from a Troubled Archipelago: leadership, agency and change in the 21st century university

Conor Galvin

UCD

The university in contemporary Ireland is an interesting if conflicted space. We are part in the past – institutional and intellectual histories & traditions continue to shape what and how we interact with society. We are part in the present – caught up in a seemingly endless caucus race of reform, reconstruction and shifting remit. But we are also (part)authors of our own futures in the decisions made about what truly matters in what we do, in what counts as new knowledge, and in how these relate to the public good. Academic globalization as well as localised political and economic agendas increasingly shape those decisions. As does the ubiquitous technology of these times. Ireland's universities are with increasing regularity placed at the heart of Ireland Inc as necessary engines of economic ideas, innovation and change-leadership.

Yet in ways the idea of the university has never been as fragile as it is today. Undoubtedly we need to keep up with a complex and rapidly changing world. But to do so (and to retain a capacity for innovation) the university also needs to offer spaces for critical scholarship and creativity. The proposed paper considers ways in which Ireland's universities seem increasingly to be failing in this and the forces that seek to move us away from such concerns: it looks at questions of leadership, agency and change. The intention is to stimulate discussion and debate on these issue as well as suggest ways in which the university's wider roles and responsibilities might, at the very least, be sustained through troubled times.

Promotion of creativity: a website-based approach

David J. Adams

UK Centre for Bioscience, University of Leeds

At the interactive Creativity in the Biosciences website students are introduced by leading researchers to cutting edge developments in the biosciences. They are then asked to consider problems and challenges associated with these developments e.g. how to commercially exploit the results of research. To help them with this, students interact with a wide range of techniques designed to promote creativity in individuals. The website allows students to work in geographical isolation but novel software enables and encourages regular communication between group members by facilitating easy exchange and effective presentation of ideas. Students then participate in structured group sessions that ensure full and thorough consideration of ideas by group members. The website encourages all members of the group to engage in creative approaches to problem-solving. The overall approach has great potential in a wide range of settings and disciplines both in HE and industry. The website can also support and encourage interdisciplinary cross-talk and collaboration as colleagues from different backgrounds work together on idea generation and exploitation.

Novel reading for novel learning

Rana Dajani

Biology Department, Hashemite University, Jordan

In many cases, students may not be interested in the courses they take because they are obligatory and/or may not be related to their major.

In order to pique their interest, one may assign a novel that revolves around concepts taught in the course. The idea is that when the student reads the novel he or she becomes interested in the material of the course and hence wants to learn more to understand the novel.

The reading levels of students is low. Assigning a novel to be read as part of the course requirements will help increase reading levels of students.

The assignment would include in addition to reading; questions pertaining to content, opinion of reader in terms of characters, future of the theme, etc. This will allow the students to comprehend how the information they take in the course has a real world application or effect. Hence, tying their education to the real world which will help them develop better skills for tackling the real world and becoming therefore better citizens.

Example:

Course Molecular Biology

Novel: Darwin's radio by Greg Bear

The novel material covers the basic concepts of molecular biology and techniques. It also covers the ethics of the application of molecular biology to real life situations.

Section 5

General Information for Delegates

This section contains general information on the symposium venue, Galway city, the registration process, transport, internet access, and the symposium dinner. Also included are some useful maps to direct you around the campus and the route from the university to the Radisson Hotel.

5.1 About the National University of Ireland, Galway

(Source: <http://www.nuigalway.ie/about-us/who-we-are/our-history.html/>)

From Queen's College to National University of Ireland, the University's past is intertwined with the history of Galway and Ireland.

Beginnings

The Quadrangle first opened its doors to 63 students on 30th October 1849 and the University, then known as Queen's College was born. The University was built at the height of the famine as part of a public works relief scheme and was one of three Queen's Colleges, the others located in Dublin and Belfast.

That Quadrangle building, built in local limestone in a Tudor Gothic architectural style, is a replica of Christ Church at the University of Oxford. The 'Quad' still stands proudly at the heart of the University today as a testament to its past. It is now used primarily for administrative purposes and houses the offices of the President and the Vice-Presidents.

In the first academic year, 1849 -1850, the University began with three faculties, Arts, Medicine and Law but there were also schools of Agriculture and Engineering. Female students later joined the student body and in 1906 Alice Perry graduated from the college, believed to be the first female engineering graduate in the world to receive a first class honours degree in civil engineering

There are many historical buildings on campus, such as the James Mitchell Museum, established in 1952. This geological museum contains high quality collections sampling a significant diversity of the planet's geology, with a fine display of fossils, minerals and rocks.

Changing with the times

The University has had three different names:

- in 1849 it was called Queen's College Galway
- In 1908 it was changed to University College Galway
- in 1997 it was changed again to National University of Ireland, Galway.

Newer parts of the University sprang up in the 1970s and were designed by architects Scott Tallon Walker. The 1990s also saw considerable development including the conversion of an old munitions factory into a student centre. Recent developments include a state-of-the-art University Sports Centre (http://www.nuigalway.ie/student-life/campus_activities/index.html) and there are many exciting projects underway to enable the University to create the 'Campus of the Future' for the now 16,000 - strong student body.

5.2 Campus Map

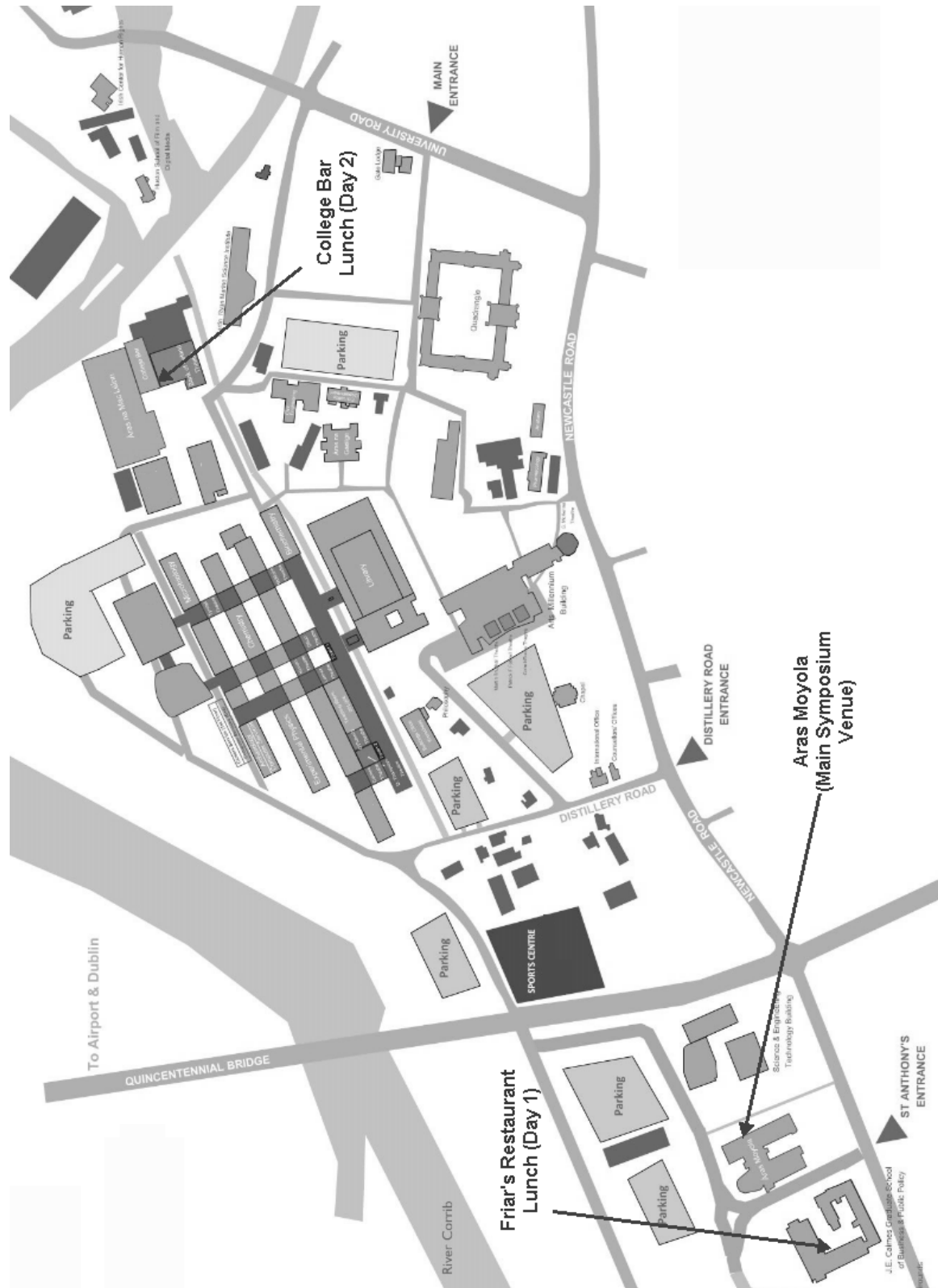


Figure 1: Map of NUI Galway Campus

5.3 Galway City Map

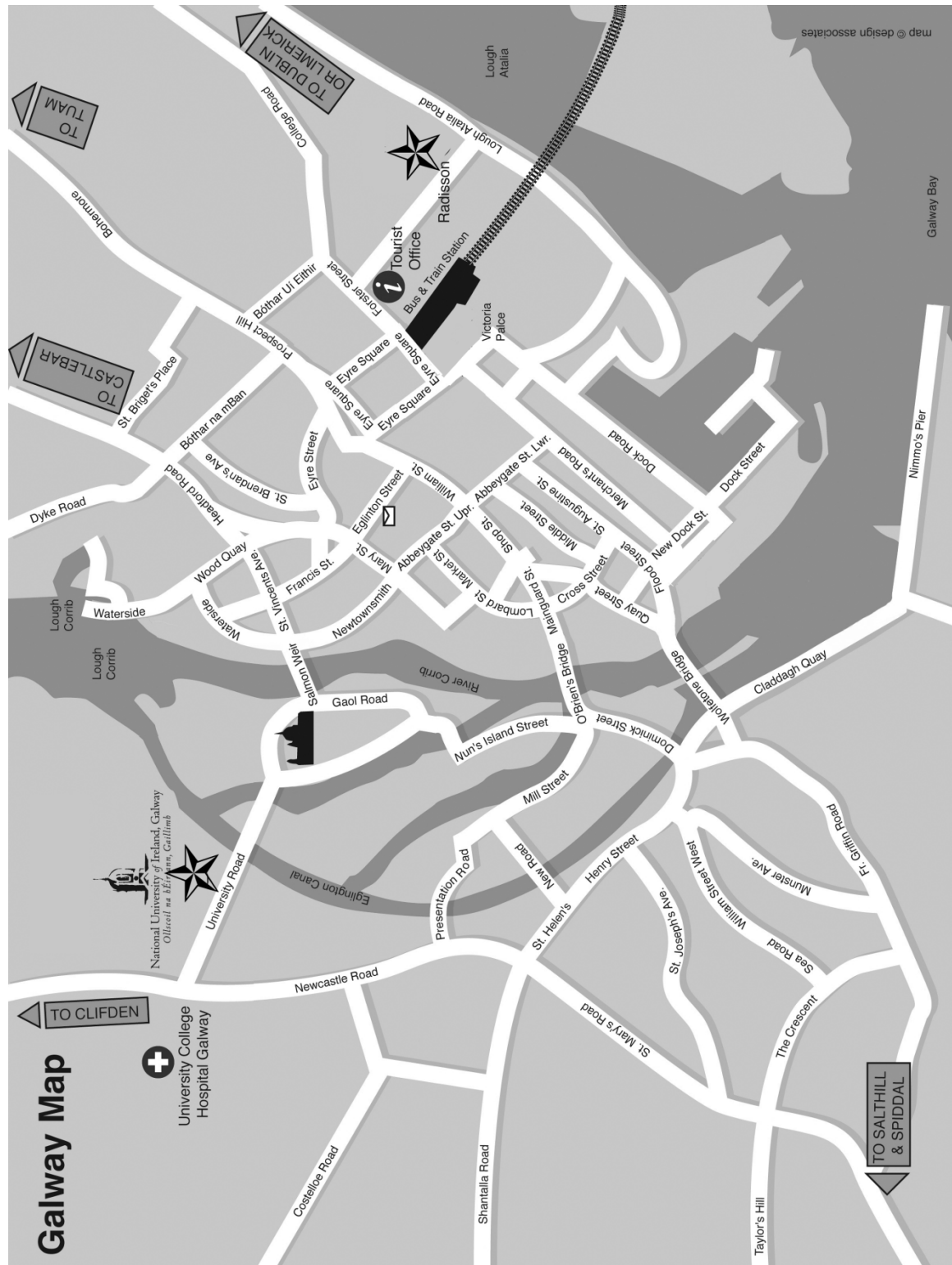


Figure 2: Map of Galway

5.4 Symposium Registration and Information Desk

Registration will be at 8.45am on Thursday 10th of June. The Registration Desk will be located on the main Foyer of the Áras Moyola Building. The desk will be manned from 8.30am to 5.15pm on 10th June and 9.00am to 12.30pm on 11th June.

5.5 Transport

Information on the best way to get to the National University of Ireland, Galway by train, road or air is available on our website at

http://www.nuigalway.ie/about/getting_to_nuigalway.php

5.6 Internet Access

Limited internet access is available. A small number of logon accounts will be available, and allocated on a first come first served basis. Delegates may request further information on this from the Symposium/Registration Desk.

5.7 Twitter

For those who like to Tweet, and please do Tweet, the hash tag for the Symposium is #celt10.

5.7 Messages

During the symposium hours messages for other delegates can be left at the Symposium desk, in the foyer of the Áras Moyola Building. It is the responsibility of delegates to regularly visit the registration desk to check for messages.

5.8 Personal Property

Neither the University nor the Symposium organisers can accept any responsibility for loss or damage to personal property.

5.9 Symposium Dinner

The official symposium dinner will be held on Thursday, 10th June at 7:30pm in the Radisson Hotel, at the cost of €50 per person. Delegates will have previously made bookings for this event when initially registering for the Symposium.



Radisson SAS Hotel

Lough Atalia Road, Galway

Tel: (091) 538300

www.galway.radissonsas.com

Section 6

Bibliography

This section contains suggested readings in the area of Creativity in Higher Education.

Books :

- Craft A (2005) *Creativity in Schools, Tensions and Dilemmas*, Routledge: Oxon
- Csikszentmihalyi M (1997) *Creativity, Flow and the Psychology of discovery and invention*, Harper Perennial: New York
- Gardner, H (2008) *5 Minds for the Future*, Harvard Business Press: Boston
- Jackson N, Olivier M, Shaw M and Wisdom J (2006) *Developing Creativity in Higher Education, An imaginative curriculum*, Routledge: London and New York
- Kaufman J C (2009) *Creativity 101*, Springer Publishing Company: New York
- Sawyer R K (2006) *Explaining Creativity, The science of Human innovation*, Oxford University press: Oxford
- Robinson, K (2001) *Out of our Minds: Learning to be Creative*, Capstone

Academic papers:

- Amabile T M and Hennessey B A (2010) *Creativity*, Annual Review of Psychology Vol.61: 569-98
- Banaji S, Burn A and Buckingham, D (2006) *The rhetoric's of creativity: a review of the literature*, paper for Creative Partnerships Centre for the Study of Children, Youth and Media, Institute of Education, University of London
- Belluigi D Z (2009) *Exploring the discourses around 'creativity' and 'critical thinking' in a South African creative arts curriculum*, Studies in Higher Education, Vol. 34, No. 6, September
- Eisner E (1998) *What do the Arts teach us?*, Royal Society of Arts Journal 2:4, 1998
- Jackson N (2002) *Designing for Creativity: A curriculum, Guide for LTSN Generic Centre Learning and Teaching Support Network*, Imaginative Curriculum Resources Archive available online from: <http://www.palatine.ac.uk/files/1028.pdf> [march 2008]
- Kleiman,P (2008) *Towards transformation: conceptions of creativity in higher education*, Innovations in Education and Teaching International, Vol 45, No 3, August 2008, 209-217
- Sawyer (2004) *Creative Teaching: Collaborative Discussion as Disciplined Improvisation*, Educational Researcher 2004; 33; 12
- Schlesinger, J (2009) *Creative misconceptions: A closer look at the evidence for the "mad genius" hypothesis*, Psychology of Aesthetics, Creativity, and the Arts, Vol. 3, No. 2, 62-72.

Reports and official documents:

- Cachia, R, Ferrari, A and Punie, Y (2009) *Innovation and Creativity in Education and Training in the EU Member States: Fostering Creative Learning and Supporting Innovative Teaching*, Literature review on Innovation and Creativity in E&T in the EU member States (ICEAC), European Commission Joint Research Centre, Institute for Prospective Technological Studies, available from: http://ftp.jrc.es/EURdoc/JRC52374_TN.pdf

European University Association (2007) Creativity in Higher Education, Report on the EUA creativity project 2006-2007, available from:
http://www.eua.be/fileadmin/user_upload/files/Publications/Creativity_in_higher_education.pdf

European University association (2009) Improving quality, enhancing creativity: change processes in European Higher Education institutions, Final Report of the quality assurance for the higher education change agenda (QAHECA) project, EUA Publications 2009, available from:
http://www.eua.be/fileadmin/user_upload/files/Publications/QAHECA_Report.pdf

Florida, R and Tinagli, I (2004) Europe in the creative age, report for Demos, available from:
<http://www.demos.co.uk/publications/creativeeurope>

National Advisory Committee on Creative and Cultural Education (1998) All Our Futures: Creativity, Culture and Education, DCMS/DfEE: London

Resources online:

Palatine Resources, The higher education Academy, available from:
<http://www.palatine.ac.uk/resources/>

The imaginative curriculum Resources, Palatine, The Higher Education Academy, available from:
<http://www.palatine.ac.uk/resources/imagincurric/>

Creativity and Innovation European Year 2009 website, available from:
<http://www.create2009.europa.eu/>

TED TALKS:

Brown Tim, "Tim Brown on creativity and play", TED 2008, available from:
http://www.ted.com/talks/lang/eng/tim_brown_on_creativity_and_play.html

Glennie Evelyn, Evelyn Glennie shows how to listen, TED 2003, available from:
http://www.ted.com/talks/lang/eng/evelyn_glennie_shows_how_to_listen.html

Robinson Ken, "Ken Robinson says schools kill creativity", TED2006, available from:
http://www.ted.com/talks/ken_robinson_says_schools_kill_creativity.html

Robinson Ken: "Bring on the learning revolution!", TED2010, available from:
http://www.ted.com/talks/sir_ken_robinson_bring_on_the_revolution.html