

**An investigation of the impacts of the cross-
university 'research informed teaching' initiative
at the University of Plymouth
2007-2010**

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Introduction:

The relationship between staff research and student learning is a longstanding and controversial issue in Higher Education (HE). Historically there has been staunch support for the argument that research is part of the meaning of 'the university' (Barnett 1990) and HE in the UK has always had research as a core element.. Yet the conceptual relationship between the two has been difficult to establish. Since the 1960s, changing influences including increasing state intervention, the skill requirements of a post-industrial economy and the need for cost effectiveness have brought this debate yet again to the fore, initiating questions about the academic, political and economic rationale for a HE structure based on both enterprises. 'The debate over research has become the battleground for the competing ideologies of the academic community and the state' (Barnett 1990:123).

Throughout the 1990s there was increasing pressure from the elite universities for state funding of research to be focused more narrowly (Brew 2003; Jenkins *et al.* 1998). In 2000, the Higher Education Funding Council for England (HEFCE) suggested that not every teacher needed to be involved in cutting edge research¹ and the 2003 White Paper, 'The Future of Higher Education further questioned the relationship between research and teaching:

"We believe that the time has come to look carefully at the relationship between research and teaching. In reality, the connection between an institution's research activities and its teaching is indirect, and there is ample evidence of the highest quality teaching being achieved in circumstances which are not research-intensive. The scale and location of research activity has to be justified and decided on its own merits" DfES (2003:30).

¹ Although all should engage in scholarship to benefit their role as teachers.

Through its commitment to investing in and maximising on the 'benefits which flow from concentrating the best research in larger units' (DfES 2003:6), the White Paper was interpreted as raising the possibility of 'teaching only' universities which renewed debate about the conceptual links between research and teaching. Subsequent research suggested a number of possible links and provided support for making the link between teaching and research more explicit (Brew 2003; Griffiths 2004; Jenkins 2004). This work contributed to an apparent change of mindset about teaching only institutions and an announcement in 2006 by HEFCE that 40 million pounds of funding from the Teaching Quality Enhancement Fund (TQEF) would be provided to support 'teaching informed and enriched by research'. This funding was awarded in inverse proportion to an institution's HEFCE (QR) funding on the premise that research intensive institutions should already provide teaching enriched by research.

The University of Plymouth (UoP) was successful in bidding for TQEF funding and has supported a range of staff led research informed teaching projects throughout 2007-8, 2008-9 and 2009-10. This study aims to investigate the impact of this initiative and to draw out recommendations for strategic development of the research informed teaching agenda both at Plymouth and in the wider national and international context.

Aim and objectives:

The aim of this research project was to investigate the impact of the cross-university research informed teaching scheme at the UoP.

The objectives of this research were to:

- Identify the implicit and explicit conceptions for research, teaching and the links between them which underpin the funded UoP research informed teaching projects;

- Identify what the projects were aiming to achieve in terms of research and/ or research enhancement, and to what extent they were successful in these aims;
- Establish what wider lessons can be learnt from the Plymouth research informed teaching experience about the possibilities and problems with linking teaching and research in HE.

Research Strategy:

The first stage of the research involved analysing bid documents and interim reports of each of the 38 projects that were undertaken throughout 2007-2010, in order to identify the explicit or implicit conceptions of research-informed teaching which underpinned the projects. The second stage of the research was to conduct semi-structured interviews with the leaders of research informed teaching projects. Semi-structured interviews were chosen to allow deviation from the interview schedule where this offered potential for deeper exploration of salient issues². The interviews were structured into two sections. The first section ascertained the role of the project leader at the university, their views on teaching and research (in relation to their subject area), their strategies for managing teaching and research, their understanding of research informed teaching and their perceptions about its benefits and disadvantages for staff and students. The second section specifically focused on the projects. These questions clarified the aims of the project and sought to establish how it met the criteria of research-led, research-orientated and research-based conceptions of research-informed teaching. Interviewees were asked to identify barriers to project development and to describe how the project enhanced the student experience, curriculum development, changed the practice of colleagues and impacted on the wider faculty/university. Interviewees were also asked if undertaking the project had changed their own perceptions about research informed teaching and if they

² Deviation was in addition to the set interview schedule.

were able to identify opportunities for further initiatives. Further questions addressed project evaluation and strategies for securing further funding. The third stage of the research was to interview the Associate Dean for Teaching and Learning (ADTL) for the faculties of Technology, Social Science and Business (SSB), Education, Science and Arts³. The purpose of these interviews was to ascertain understanding and awareness of research informed teaching at the faculty level, to determine the impacts of individual projects upon faculty practice and to establish the ways and extent to which commitment to research informed teaching would continue in the future.

At the time of writing this report, the bid and interim reports are under analysis, 22 interviews with project leaders have taken place and are in the process of being analysed and the interviews with the ADTLs have been undertaken but not yet analysed. The project is on course but very much work in progress.

Preliminary findings:

Table 1 provides an overview of the projects which took place to September 2009⁴ and details their titles and aims in terms of research informed teaching. It demonstrates that out of 30 projects that took place, 23 projects pursued research led objectives, 18 research orientated and 20, research based. Ten projects claimed to pursue all 3 objectives.

³ The faculty of Health and Social Work did not have an ADTL at the time of this study.

⁴ The 2009-10 cohort is not included in Table 1.

Table 1

Project Number	Project title	Research-led	Research-orientated	Research-based
Faculty of Social Science and Business				
1	MSc social research: work based learning	X	X	X
21	Undergraduate social research fieldwork module	X	X	
22	Work based learning: refugee students	X	X	X
23	Transport Geography	X	X	X
24	MRes/MSc Sustainable environmental management	X	X	
25	Research led investigation into coastal processes			X
26	Working in international contexts	X		X
28	Enhancing student involvement using case studies			X
30	Professional placements for social research students	X	X	X
31	E-archiving of Masters theses	X	X	X
Faculty of Arts				
5	Blended learning with e-resources			X
6	19 th and 20 th century research website			X
7	Web based learning: Faculty of Arts	X	X	
8	Bridging the gap	X	X	
9	SPARCC	X		X
10	The littoral zone	X		
11	Roosevelt study centre fieldtrip	X	X	X
12	Violence against women 18 th -19 th century	X	X	X
32	Fieldtrip art history Vienna	X	X	X
Faculty of Education				
14	Supporting critical reflection in PG development t	X	X	X
15	Supporting students: independent study modules		X	X
16	Developing learner hubs			X
Faculty of Science				
2	E-journal: Student Scientist	X	X	
4	Student training in active research	X	X	X
Faculty of Technology				
17	Enquiry based curriculum		X	X
18	Joint centre for design and technology	X	X	X
Faculty of Health and Social Work				
3	Embedding research skills undergraduate mental health programme	X		
13	Games teachers play	X		
19	Clinical/practical skills of health professionals	X		
20	Medial bodies online	X		
30	Total	23	18	20

Views on research, teaching and the links between them:

Staff interpretations of research varied. Although discipline based research was perceived as the fulcrum of academic activity, research was understood as a complex of complimentary activities which included writing reviews, editing journals, refereeing journal papers and attending conferences, seminars and discussion groups. These descriptions suggest that research is primarily understood in terms of research outputs⁵ (Brew 2001b). There was widespread acceptance that being research-active was essential to pursuing an academic career and all staff were enthused about their disciplinary research.

There was agreement that some teaching was necessarily transmissive and mechanical to provide students with necessary subject content but that the main role of the lecturer was to facilitate independent learning and the development of critical thinking.

Evidence from the data suggests that staff were implicitly aware of some aspects of the research-informed teaching agenda before the TQEF UoP scheme; most staff reported that teaching research was part of their job and a common academic activity. However, staff reported that before the scheme they had held only low levels of awareness of research-informed teaching concepts or the literatures informing them.

Obviously we're teaching research to students so it's kind of part of what we do, so it's there but I guess I didn't really think about what it meant before or hadn't really thought about it. I hadn't really heard people talking about it before.

Participation in the UoP scheme had raised awareness of research informed teaching and staff were able to discuss their views about the research – teaching link. In all cases staff were convinced of the importance of

⁵ Representative of a 'trading variation' where research is traded as a commodity and is traded for career advancement.

undertaking and keeping up to date with research in order to teach effectively. Research and teaching were described as existing in a symbiotic relationship and as being 'inextricably intertwined' and as an integral part of academic scholarship (Boyer 2000;2002). The data demonstrate how research provides material for teaching purposes and how teaching motivates the need to participate in and keep abreast of research developments.

Although all staff described the link as using their own and others' research to inform their teaching, some staff also described the link more expansively; research as a vehicle to enhance student learning and promote criticality skills.

It could be something that you are - some major project that you are immediately involved in that might be breaking new territory that you then want to represent in your teaching or new modules, or a new kind of module, or a module in a new area, or with a new methodology of some kind so that you're keeping students as up-to-date or at the cutting-edge of movements within the discipline. Or it could just be more to do with your own personal research interests which may or may not necessarily coincide with the latest movements within the discipline but nevertheless reflect your own interests and the kinds of ways that you like to work or the kinds of areas, again the approaches that you like to work with and so you can better represent yourself in your teaching by reflecting your own interests in that way.

If you put the students at the heart of every activity then the idea is that either the student is reading about some research that is relevant to their own development, or they're actually doing some research.

I think it is raising the profile that students are research generators in their own right and it might be on a relatively small scale, sometimes the students are working with staff on a bigger project and it is more obvious than a medium or large scale, so it is a matter of recognising that, valuing that and how you can promote it.

Staff cited numerous benefits derived from the research-teaching links which were advantageous to staff and to students. Staff reported the benefits of enhancing scholarship, but also the benefits of having authority and credibility among students through using evidence based research which validated their own teaching. In terms of benefits to students, staff emphasised the pedagogic value of research as a vehicle for understanding; promoting

independent learning and the social-cultural value of including students in the academic community.

If we say that research is about learning, producing new ways of thinking about the world then the richer the process that students can engage in whilst doing their course, be it BA or MA; the benefits are obvious.

However, some staff also noted that a research-informed agenda poses certain challenges to students and suggested that some students groups may struggle with understanding and learning through research. It was also suggested that students who collaborate with staff on research projects may not have their contribution recognised.

Staff also recognised possible abuses of research-informed teaching. These were focused on research workloads which detracted from teaching, the time costs involved in changing practice and the overuse of research, effectively limiting the curriculum. Staff also reported although they perceived research and teaching to be conceptually complimentary, in practice they were valued very differently with research seen as the dominant vehicle for career advancement and teaching as less valued, but far more time consuming.

Disciplinary interpretations of the TQEF scheme:

There was evidence that academics from cognate disciplines interpreted the scheme in similar ways (Table 2) suggesting that discipline groups have distinct views on how the research informed teaching agenda can be best met.

Table 2

<i>Academics working in the ...</i>	<i>Used the UoP TQEF initiative to....</i>
Faculty of Health and Social Work	Address a dearth of evidence based practice with which to inform student learning. To enhance practice orientated, problem solving teaching and learning opportunities.
Faculty of Education	Address the issues of making teacher training more academic by promoting a research culture which is visible to academics and students.
Faculty of Social Science and Business	Increase opportunities for teaching enhanced by reverse knowledge transfer to encourage student understanding of multiple perspectives.
Faculty of Science	Set up opportunities for student participation through mentoring schemes. Create a student-led research culture to enhance opportunities for peer learning.
Faculty of Arts	Increase students' exposure to original work to enhance their understanding of culture, context and interpretation.
Faculty of Technology	Increase student understanding of and participation in practical based physicality and kinetic skills.

Curriculum development:

On a project to project basis there was evidence of a range of distinct and innovative approaches to enhancing the curriculum through research. It was clear that most staff have an expansive view of 'curriculum' which included both course content and pedagogic practice. Staff talked about how their projects contributed to curriculum development directly, through formalised

channels and indirectly, where initiatives were infused into and in addition to current curricula.

The projects contributed to curriculum enhancement in different ways. A number of projects developed new content for the benefit of staff and students, for example, projects in architecture and shipping developed e-archives of excellent Masters Dissertations, two projects from the Faculty of Arts developed online resources of historical literature and other projects developed online resources to support students in developing independent study skills (Faculty of Education) and improving clinical practitioner skills (Faculty of Health and Social Work).

Other projects focused on exploring and developing innovative pedagogic approaches. In the Faculty of Science, staff working on the Student Training in Active Research (STAR) project described the benefits of student engagement without assessment as a rationale *for not* embedding the project formally in the curriculum. In the Faculty of Education there was a focus on expanding students' understanding of pedagogical relationships rather than developing new curriculum content. In the Arts there was broad interest in developing workshops as a pedagogic approach which could benefit students' learning experiences. Workshops were noted as useful for teaching research methods, for enabling apprenticeship style learning scenarios where students could learn more about staff research and practice, for facilitating interdisciplinary collaborations and promoting vertical cooperation between students and staff.

What we've done, pedagogically, the nature of the way that we've done that has been as cross-disciplinary workshops, well one way that we've done that in quite a big way and those worked horizontally and vertically as well. An example is that we've got one coming up at the end of February which is using the Immersive Vision Theatre and using a couple of other technologies that we've got around the Campus. We have students coming in at masters level, in between the final stage at masters level and some students from Norway coming from a very prestigious design college there and we have post graduate students from UCL, School of Architecture, and we're using our undergraduates and masters students and also students from the Faculty of Arts – they're going to be working on a collaborative workshop which works across the disciplines and also up and down our courses. These are very intensive workshops and these are the sorts of partnerships that start to address

what you might term global education in the sense of understanding different facets of design.

Several projects used fieldwork as a vehicle for learning. Two of these projects were in the School of Geography and the other in the Arts. Staff on all of these projects described numerous benefits to students' learning including exposure to real world issues, problem solving, linking theory and practice and developing professionalization. Fieldwork was perceived as an effective way to structure learning in these disciplines. The social element of fieldwork was also noted as useful in promoting dialogue between staff and students about the tasks at hand and, in the case of Art History, had influenced the lecturer's own ideas to the extent that she had acknowledged participating students in published work.

One student said the field trip made them feel like an Art Historian and not like a student and that was crucial for me – one of the things that we try and do in Art History is to try and professionalise the subject and that with a degree in Art History they can go on to become researchers, archivists, curators, teachers and they felt after doing the trip and the assessment that they could have done all of those things. It empowered them and they felt like proper Art Historians.

There were several other examples of pedagogic innovation. Staff in the School of Geography experimented with student-led conferences which were perceived as beneficial to the students' experience of research culture and exposed them to a wider range of case studies and materials than would normally be covered by lectures. The Faculty of Science had created an e-journal to showcase excellent examples of student dissertations (The Plymouth Student Scientist). The idea of peers learning from peers both horizontally, as in the conference and fieldwork examples and vertically across different stages, as evident in the student scientist e-journal, workshops and fieldwork were infused throughout the data.

Issues and Barriers:

It was evident that through participation in the projects staff had developed new understandings about students' interaction with the curriculum which they

were able to take forward in their teaching practice. However, there was also evidence of barriers to long term enhancement of the curriculum: indirect rather than direct embedding of project outcomes in the curriculum, finite project funding and raising student/staff awareness of and use of resources. Staff reported a number of barriers to project implementation. The nature of these varied widely from case to case but included issues with logistics, project design and raising staff/student awareness of resources developed by projects.

In terms of logistics, staff reported time constraints, recruitment time lags, technical expertise, copyright and external constraints as issues which impinged on project implementation. The references to issues about technology and technological expertise were invariably in relation to computing. In some cases staff needed to learn new software but more often staff had difficulty identifying where to get support. There were a number of copyright issues relating to students' work. This was a common theme due to the numerous projects which involved archiving or showcasing student work as research-led initiatives. There was a general consensus that obtaining guidance about copyright and students' work was challenging and that provision of this information will help to facilitate the trend of using student work as a teaching and learning resource. Issues relating to project design included projects going off track from the original conception, difficulties with embedding projects sensitively within the overall degree programme, challenges with implementing projects due to erroneous assumptions about how students learn and tensions evident in interdisciplinary projects. There were also issues around awareness amongst staff and students of project resources. In many cases despite promotion and signposting, resources were underutilised.

During the funding period of the projects the University was also undergoing restructuring, the impacts of which affected some projects through staff redundancies and the re-designation of staff and resources.

Funding and Sustainability:

Overall the structural dissemination of the TQEF funding which enabled staff to bid for small amounts of money was seen to be beneficial and perceived to open up opportunities for larger numbers of staff to undertake teaching projects than would normally happen .

The long term sustainability of projects was dependent on the nature of the project, the extent to which it had been formally embedded in the curriculum and whether continued funding could be secured. In several cases, staff described how the output of projects would remain intact after the funding period ended. There was evidence to suggest that projects which had developed low maintenance e-resources were likely to continue in their current form. There were also two examples of work-based learning placements and one example of fieldwork that had been embedded in the curriculum and would therefore continue.

Two project leaders were confident of obtaining funding from different sources to extend the lifespan of the project. A number of project leaders described how elements of their project would continue after the funding period but in truncated form. However, other staff were unable to identify further sources for funding and reported that the project would be unlikely to continue when the funding period ended.

Wider dissemination:

There was evidence that many projects had a high profile externally. A number of projects had also led to conference papers and journal publications. Two projects were producing resources for commercial purposes, the 'Games teachers Play' project was creating a book of resources for teachers and the Faculty of Health and Social Work project 'Integration of Health Based Practice into the Clinical/Practical Skills Development of Health Professionals' was developing video resources for clinical practice. In addition

several staff referred to national and international connections relevant to their project.

Well the hemispherical Dome has been to the Houses of Parliament, we did a presentation there as part of the BLUE Project.

Alan Jenkins who is an emeritus at Oxford Brookes he thinks it's a fabulous thing, the e-journal; the contribution of students should be carrying on. So externally people think it is good, internally people think it is good.

I know talking to colleagues who teach American History elsewhere in the country, they're really quite jealous of it as well, although I'm not sure that any of them have approached the Roosevelt Centre but it's the sort of thing that would make any programme in the country better for having and I think Plymouth's lucky to have it and should really try and invest in it, try and keep it going.

The following list provides a summary of significant outputs to date:

Conference Presentations

Blakeley G, Skirton H, Cooper S, Allum P, Nelmes P. (2008) Games Teachers Play. Vice Chancellors' Teaching and Learning Conference, University of Plymouth, 2008.

Blakeley G, Skirton H, Cooper S, Allum P, Nelmes P. (2009) Educational gaming in the health sciences: a quantitative systematic review. Clinical Skills conference – Prato, Italy 1-3 July 2009

Blackburn, S. (2007) Littoral Dialogues I, 30 May 2007, University of Plymouth.

Blackburn, S. & Nicol, L. (2008) Reflections on Green Infrastructure in Plymouth, UK: green lungs & countryside access, approaches to nature and place. Rural Futures Conference 2008 Dreams, Dilemmas, Dangers. University of Plymouth.

Blackburn, S. & Nicol, L. (2008) Reflecting on Cross Disciplinary Collaborations: the planner's world and the artist – work in progress¹. Methods@ Plymouth 2008, 15-16 May 2008, School of Law & Social Science, University of Plymouth.

Cunliffe, A. & Robinson, J. (2008) Work based learning for refugee studies students. Workshop presentation at the Vice Chancellors Conference, University of Plymouth, Plymouth 2008.

Edwards, A. & Gresty, K. (2009) Exploring Both Sides of an Undergraduate e-Journal: Celebrating Excellence and Supporting Academic Writing. International Education Research Conference (IPED). Coventry 14-16 September.

Edwards, A, Gresty, K., Kingston, K. & Auburn, T. (2008) The Plymouth Student Scientist. Case study paper and poster presentation at The Full 360°: Mapping the Undergraduate Research Inquiry Landscape conference, University of Gloucestershire, Cheltenham. 1 May.

Edwards, A, Gresty, K., Kingston, K. & Auburn, T. (2008) The Plymouth Student Scientist. Case study paper and poster presentation at The Full 360°: Mapping the Undergraduate Research Inquiry Landscape conference, University of Gloucestershire, Cheltenham. 1 May.

Gresty, K. & Kingston, K. (2007) The Plymouth Student Scientist. Workshop presentation at the Vice Chancellors Conference, University of Plymouth, Plymouth. 28 June.

Gresty, K., Auburn, T., Kingston, K. & Edwards, A. (2008) Using an e-journal to support research-informed teaching. Paper presentation at the 'Informing Active Engagement in Learning and Teaching for 21st Century Universities' conference, University of Gloucestershire, Cheltenham.

Gresty, K., & Edwards, A. (2008) The Plymouth Student Scientist e-journal. Workshop and poster presentation at the Vice Chancellor's Conference, University of Plymouth, Plymouth. 4 July.

Murray, S., Phillips, M., Speed, C. & Thomas, P. (2008) Intelligent architecture – complex environmental networks. Panel session at the International Symposium on Electronic Art (ISEA) Singapore.

Parker-Rees, R. & Haynes, J. (2009) Results from the CARATAS project evaluation. Annual Conference of the Society for Research into Higher Education (SRHE). December 2009.

Pasukeviciute, I. and Pyne, R. Poster entitled "Student Perceptions of Sustainability in Shipping and Logistics", VC's Learning and Teaching Conference, University of Plymouth, 4 July, 2008.

Pasukeviciute, I. and Pyne, R. Poster entitled "Raising Sustainability Awareness in International Logistics Management Students through an Enquiry Based Postgraduate Curriculum", All Our Futures Conference, University of Plymouth, 9-11 September, 2008.

Walsh, C. & Schnall, S. (2008) Student Training in Active Research (STAR) presentation at the Vice Chancellors Conference, University of Plymouth, Plymouth. July 2008.

Peer reviewed journal publications

Blakely G, Skirton H, Cooper S, Allum P, Nelmes P. (2008) Games Teachers Play: a Systematic Review of the Efficacy of Games as a Teaching Strategy in the Health Sciences. *Journal of Advanced Nursing*. Nov 14.

Blakely G, Skirton H, Cooper S, Allum P, Nelmes P. A mixed methods study of the use of educational gaming within health professional education. Submitted to *International Journal of Nursing Education Scholarship* for publication, in review

Pasukeviciute, I. (2009) Raising Sustainability Awareness among an International Group of Business and Management Students through an

Enquiry Based Postgraduate Programme. Submitted to International Journal of Management Education (currently under review).

Reports

Blakely G, Skirton H, Cooper S, Allum P, Nelmes P. (2008). Games Teachers Play: A Review of the Efficacy of Games as a Teaching Strategy for Health Sciences. Report from the University of Plymouth Games Project.

Chapman, S. (2008) Report on the symposium: Research Through Practice: Exploring Consciousness, Peninsula Arts, University of Plymouth, 19th June 2008.

Books

Blakeley G, Skirton H, Cooper S, Allum P, Nelmes P (2009) Games! Games! Games! Educational games for teaching health professionals. Currently being formatted for publication by University of Plymouth Press.

New Journals

'The Plymouth Student Scientist' ISSN 1754-2383 [Online] ©University of Plymouth

'Environmental Art and Architecture' to be published by Intellect from 2011. The proposed interdisciplinary journal focuses upon the juncture of man, environment and technology.

Exhibitions

Aldworth, S. (2008) Scribing the Soul. Exhibition Catalogue. The Creative Group.

SPARCC projects were disseminated to the public as exhibitions Social Hacking (Plymouth), With Heartfelt Gratitude for the Painless Treatment

(Bristol and Cardiff) and Correspondences (Toronto and Plymouth), in publications such as Short Fiction and on our website <http://www.sparcc.org.uk/>. The activities have also been featured on the websites of those who have participated in or led projects. Some URL's which feature SPARCC projects are:

<http://subprodukt.blogspot.com/2007/11/fantomat-workshop.html>

<http://www.youtube.com/watch?v=0QoF6wDqydU>

<http://www.youtube.com/watch?v=0QoF6wDqydU>

<http://www.kurator.org/wiki/main/read/Hack+Commissions>

New Modules

In the Faculty of Social Science and Business the MSc Social Research Methods has had two new modules created as a result of the TQEF funding, the 'professional placement option' and 'work based learning' modules have both been accredited.

In the Faculty of Science, the School of Geography have accredited a Stage 3 fieldwork module into coastal process in Portugal as a direct result of the TQEF funding.

There was, however, evidence of a lack of formal internal dissemination about the TQEF projects and staff believed this impinged on the impact the scheme was able to have in terms of influencing the actions of others in the wider university. Although some staff members reported presenting their projects internally, the majority had not done this. Several, however, reported influencing colleagues through informal conversations about the benefits of the project for teaching and learning.

Recommendations:

All recommendations at this stage are preliminary as the project is still underway. It is clear that research informed teaching motivates staff to be

creative and contributes to current teaching approaches to enhance teaching and learning, however, the data suggest that the following areas may benefit from attention.

Guidance for staff:

Peer learning is a central theme throughout the research informed agenda at the UoP, there may be need for evidence-based guidance on the benefits and limitations of peer learning to help staff engage with this popular medium.

Copyright issues relating to student work is an issue that several projects have struggled with. Considering the popularity of peer-learning and the use of student work to promote this, guidance on copyright should be made available and clearly signposted to staff.

Using research-informed teaching to foster professionalisation in students is highlighted as a key benefit of this agenda. Guidance for how to set up schemes, assess and evaluate professional placements may be helpful to other academics interested in this idea.

It is clear that a pedagogic agenda is central to the research informed teaching scheme at the UoP. Examples of, guidance and support about pedagogic innovation would be useful to staff interested in this area. There is a wealth of information available nationally via the Higher Education Academy (HEA) website⁶ which staff can be made aware of. Stronger internal dissemination of the research informed teaching scheme could also be useful in promoting pedagogic innovation to a wider audience.

Several staff voiced concerns over the impact of competing agendas and wanted guidance on how to reconcile research informed teaching and enterprise.

⁶ <http://www.heacademy.ac.uk>.

A central point of contact for staff needing technical support would also be of assistance.

Funding:

Finite funding poses challenges to the sustainability of projects, the time scale in many cases was insufficient for activities to be formally embedded in the curriculum. This raises wider challenges about the effectiveness of project funding in comparison to ongoing funding like the QR funding model.

Research based teaching was often embedded within work-based placements and fieldwork which can be both expensive and time consuming. In a financial climate where it is unlikely that such opportunities will be available to all students cheaper alternatives may need to be found on a scale appropriate to a mass higher education system.

Dissemination:

There is a need for information about the scheme and the results of individual projects to be more widely disseminated within the university so that the institution as a whole can benefit. Although all final reports are available on the university extranet⁷ and there was some dissemination at the 2008 VC's Teaching and Learning Conference, more could be done to promote what has been learnt about research informed teaching in the Plymouth context to university staff.

Wider implication:

There is evidence that staff struggle to reconcile their roles as teachers and researchers, that they are aware that career progression is dependent on their research profile, yet, in most cases staff spend the majority of their time on

⁷ <http://www.plymouth.ac.uk/pages/view.asp?page=8148>.

teaching. This indicates a need to raise the profile of teaching as a highly valued academic activity which is embedded into career paths.

Continuation:

The project is currently in progress and due to run until September 2010. The final cohort will take place in the academic year 2009-10 and will be included in this evaluation. An institutional report will be made available in 2009.

Project Outcomes:

The project findings are fed into the Learning and Teaching in Higher Education (LTHE) module 551 'Teaching Research'. They have also led to a number of conference presentations and peer reviewed papers are expected to follow.

Winter, J. and Cotton, D. (2009) Research Informed Teaching: Impacts and Implications of the TQEF Scheme. *The Higher Education Academy Annual Conference*. University of Manchester. 30 June 2009.

Winter, J. and Cotton, D. (2009) The culture of teaching and learning – Influences and impacts. A UK case study. *The International Society for the Scholarship of Teaching and Learning Annual Conference*. University of Indiana, Bloomington, USA, 24 October 2009.

Winter, J. and Cotton, D. (2009) The research-teaching nexus in an era of mass higher education. *Society for Research in Higher Education. Annual Conference*. Wales. 8-10 December 2009.

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NJ, Foundation for the advancement of Teaching

Boyer Commission on Educating Undergraduates in the Research University.
(2003). Reinventing undergraduate education: three years after the Boyer
Report, State University of New York at Stony Brook.

Brew, A. (2001). The Nature of Research: Inquiry in Academic Contexts.
London, Routledge Falmer.

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implications for inquiry-based teaching and learning in higher education "
Higher Education Research and Development 22(1): 3-18.

(DfES) (2003) The Future of Higher Education DfES, HMSO.

Griffiths, R. (2004). "Knowledge production and the research-teaching nexus:
the case of the built environment disciplines." Studies in Higher Education
29(6): 706-726

Jenkins, A. (2004). A guide to the research evidence on teaching-research
relations. London, The Higher Education Academy

Jenkins, A., Blackmak, T, Lindsay, R. and Paton-Saltzberg, R. (1998).
"Teaching and research: student perspectives and policy implications "
Studies in Higher Education 23(2): 127-141.

Higher Education Academy (HEA) (2009). Reward and recognition of teaching
in Higher Education York, The HEA and GENIE Centre of Excellence,
University of Leicester