

# The boundaries of architecture research and the nature and scope for collaboration in architecture research across HEIs in Scotland<sup>1</sup>

## The boundaries of architecture research

Architecture research is fairly unique in its breadth of scope, basis in design, and the fact that significant practice-based research also takes place (although not uniquely so). This breadth can be defined by cognate area (e.g. design, technology, construction, cultural context, and practice/management/legal issues<sup>2</sup>), the application of different epistemological traditions (i.e. natural and social sciences, arts and humanities) and their various methodologies (e.g. quantitative, qualitative methods, critical analysis), or the function of architecture research (e.g. knowledge search, specific project-based research and development, wider applied and pure research), amongst other possible typologies. Where architecture research begins and other forms of research stop is a question which tends to exercise minds most when considering, for instance, how architecture research will be assessed within an overall research assessment such as that which the government is about to embark on once again.

Is this question necessary? Does a subject area within academia need to be exclusively defined with 'hard' boundaries, or can it be defined in a 'softer' way, perhaps self-defined? In essence this is what has happened in the past research assessment exercises as institutions have opted whether to submit within at least three (and sometimes four) different Units of Assessment: Built Environment; Art and Design; and History of Art, Architecture and Design (with some also in Town and Country Planning). To some extent the problem arises in that architecture academics have expressed concerns that their research is not well assessed through these options. As a result the name and panel constitution of one Unit of Assessment (Architecture and the Built Environment) has been changed. However, as there is still no requirement to submit architecture research only to this panel, the self-definition of architecture research is likely to continue, albeit with possibly more or less cross-referral.

If the RAE does not create hard boundaries for architecture research, are these needed within academia for other reasons? One possible reason might be other forms of funding, such as Research Councils, but as these define their criteria more by epistemological traditions and methodology, again architecture research needs to self-select and define its objectives, methods etc. in relation to the main Research Councils of relevance and their interests (i.e. Arts and Humanities Research, Economic & Social Research, and Engineering & Physical Sciences Research Councils). This argument also applies to research methodologies, as demonstrated in the recent book 'Architectural Research Methods' edited by Linda Groat and David Wang, illustrating the application of a wide range of research methods within architecture research (mostly in North America). These 'soft boundaries' of architecture research are also obvious in areas where professional accreditation may overlap.

It would thus appear that – from an intellectual point of view – there is no need to have a hard boundary for architecture research, but perhaps a clearer understanding of core areas of research, such as those defined by cognate areas. What is perhaps more necessary is an institutional definition to delimit which institutions are considered to be involved in architecture research. This is perhaps most obvious in the definitions and relationship between "architecture" and the "built environment", which remain grouped for RAE purposes. However, the fact that many architecture schools/departments existing within institutional settings other than the built environment (such as arts, humanities, social science) - and with other orientations – also leads to this being essentially a 'soft' definition.

If there are no clear hard boundaries for architecture research, but only some core areas, this also reflects the enormous scope for cross-disciplinary research within the broad definition of architecture research. This spills over into environmental and interior design, landscape architecture, planning and property studies, building science and engineering, social science,

**ScotMARK**

Scottish Matrix for Architectural Research and Knowledge

School of Architecture | Edinburgh College of Art | 79 Grassmarket | Edinburgh | EH1 2HJ  
t: +44 131 221 6184 | f: +44 131 221 6157 | [scotmark@eca.ac.uk](mailto:scotmark@eca.ac.uk) | [www.scotmark.eca.ac.uk](http://www.scotmark.eca.ac.uk)

ScotMARK is funded by a Scottish Higher Education Funding Strategic Research Development Grant

fine art and sculpture, as well as history, cultural and urban studies. As such, the continued inclusion of architecture and built environment research in one Unit of Assessment in the RAE is probably more to do with the difficulties of institutional change than any stronger affinity in research.<sup>3</sup>

## The scope for collaboration in architecture research across HEIs in Scotland

Architecture is currently taught in 36 professionally accredited schools and departments across Higher Education Institutions in the UK, and these are based in 7 “old universities”, oriented to built environment or humanities and social science research; 5 “post-1960” universities, again mainly oriented to built environment or humanities and social science research with 1 oriented to visual arts; 18 “post-1992” universities, 10 of which oriented to visual arts and the rest the built environment; and 5 art colleges, all oriented to visual arts in terms of research. However, not all of these have strong research traditions, or in some cases any clear self-definition of research. The spread across the 6 schools/departments of architecture in Scotland is not dissimilar, as characterised below, although all these institutions have a research focus.

|                                    | Institutional context |             |             |             | School location |            |                         |
|------------------------------------|-----------------------|-------------|-------------|-------------|-----------------|------------|-------------------------|
|                                    | old Univ              | > 1960 Univ | > 1992 Univ | art college | Built Env       | Visual Art | Soc Science/ Humanities |
| Edinburgh University               | 1                     |             |             |             |                 |            | 1                       |
| Dundee University                  |                       | 1           |             |             |                 | 1          |                         |
| Glasgow, University of Strathclyde |                       | 1           |             |             | 1               |            |                         |
| Aberdeen, Robert Gordon University |                       |             | 1           |             | 1               |            |                         |
| Glasgow, Mackintosh School of Art  |                       |             |             | 1           |                 | 1          |                         |
| Edinburgh College of Art           |                       |             |             | 1           |                 | 1          |                         |

Other than the above schools/departments, building services and architecture engineering are taught at Heriot-Watt University School of the Built Environment, with the former also being taught at Napier University School of the Built Environment and Caledonian University School of the Natural and Built Environment, again with varying strengths of research focus. This raises the question concerning which HEI schools/departments should be involved in possible collaboration on architecture research in Scotland through ScotMARK.

In the conception of ScotMARK, there has been an implicit assumption that architecture research should be distinguished from other forms of research in the built environment in institutional terms, mainly as architecture schools are not generally embedded within schools of the built environment in Scotland. The Scott Sutherland School is the exception to this, institutionally grouping construction, property and surveying with architecture at school/department level. However, although separate at school/department level, the other 5 schools/departments of architecture are embedded within a wide variety of other higher institutional entities: a Faculty of Engineering (Strathclyde); a School of Arts, Culture and Environment (Edinburgh University); and the Faculty of Duncan of Jordanstone College (the former art college in Dundee). These groupings, however, probably have more to do with general university management issues than disciplinary affinity in practice. The exception to date to the inclusion of schools/departments which specifically teach and research architecture has been the inclusion in ScotMARK deliberations of the School of the Built Environment at Heriot-Watt University, partly as this has a specific architectural engineering focus, including involvement in architecture research.

## The nature of possible collaboration across HEIs on architecture research in Scotland

### ScotMARK

Scottish Matrix for Architectural Research and Knowledge

School of Architecture | Edinburgh College of Art | 79 Grassmarket | Edinburgh | EH1 2HJ  
t: +44 131 221 6184 | f: +44 131 221 6157 | scotmark@eca.ac.uk | www.scotmark.eca.ac.uk

ScotMARK is funded by a Scottish Higher Education Funding Strategic Research Development Grant

What is the best way to promote collaboration in architecture research across HEIs in Scotland – the main brief for ScotMARK? This has been approached to date by accepting that what is architecture research is conceptually largely self-defined - albeit subject to scrutiny by institutionally (and usually disciplinarily defined) peer groups - with some definition of (at least initial) institutional involvement based on the existing schools with more explicitly defined architecture research. This distinguishes architecture research to date from built environment research per se, albeit accepting considerable overlap and potential crossover, in as much as it distinguishes from engineering research, art & design research or other potential disciplinary linkages. However, as is evident in the research being collected from the core schools/departments, there is considerable porosity of any defined boundary. Arguably this is what is needed for both academia and the profession, although for practical purposes there have to be some institutional boundaries.

There would appear to be a variety of options for promotion of both broader and deeper architecture research across Scotland, ranging from better individual transfer of knowledge between researchers and institutions, and between these and research funders and users – through to new formal institutional forms of collaboration such as a national pooling mechanism for research as has been supported by SHEFC in other areas (e.g. physics, mathematics and currently understudy for engineering). In this, there is a possible association in research training through wider sharing of information and courses etc. through to some form of Graduate School structure. Between these extremes of collaboration lie a range of options which could include:

- Coordinated /dedicated knowledge transfer, such as ScotMARK has commenced;
- Local or regional (i.e. sub-national) informal partnerships between institutions on specific areas of research and/or training;
- Regular meetings in some form of Standing Conference between the institutions and other interested parties at a national level;
- Sub-national formal partnerships and/or joint activities in research, such as may be included in the currently planned for the two Edinburgh schools/departments of architecture and the HW School of the Built Environment.

What parameters exist to condition discussion on the above? These are essentially institutional, in that intellectual collaboration – as argued above - is basically self-defining within architecture. The two main vectors will be internal and external dynamics of existing institutions. The internal dynamics to date have led to limited collaboration in research however, whether conceptually cross-disciplinary or organisationally inter-institutional. There is a strong external dynamic from the Scottish Higher Education Funding Council to pool research nationwide (albeit in various formats), due to the perception that this is needed for such a small nation with limited HEI resources. Similar external dynamics in England have led to architecture departments merging (e.g. Manchester) and a study of joint activities in Scotland has been initiated across Edinburgh architecture schools (in liaison with Heriot-Watt). ScotMARK represents an opportunity to explore these options for Scotland.

The above addresses predominantly 'internal' dynamics vis-à-vis architecture research in Scotland, with the exception of the external vector from SHEFC. Other external vectors exist however, and these also have institutional lead organisations. These include the government's Policy on Architecture for Scotland, led by the Scottish Executive Architecture Policy Unit (SE-APU), and the Research and Development Committee of the Royal Incorporation of Architects in Scotland (RIAS). Associated with these institutional initiatives are Architecture + Design Scotland and the Lighthouse, among others. ScotMARK recognises this and the Steering Group includes representatives of the two principal organisations SE-APU and RIAS, with wider liaison on architecture research promotion outwith HEIs being coordinated in a new grouping set up by SE-APU, partly at ScotMARK's suggestion. Similarly ScotMARK has liaised closely with RIAS since its inception, and is assisting in investigation of wider research interests and capacity across the profession in Scotland.

## **ScotMARK**

Scottish Matrix for Architectural Research and Knowledge

School of Architecture | Edinburgh College of Art | 79 Grassmarket | Edinburgh | EH1 2HJ  
t: +44 131 221 6184 | f: +44 131 221 6157 | [scotmark@eca.ac.uk](mailto:scotmark@eca.ac.uk) | [www.scotmark.eca.ac.uk](http://www.scotmark.eca.ac.uk)

ScotMARK is funded by a Scottish Higher Education Funding Strategic Research Development Grant

## Summarised queries for discussion

- Is architecture research self-defining in Scotland, and is there a core definition of architecture research?
- Should the involvement of institutions in collaborating in architecture research across HEIs in Scotland be self-defining and is there a core set of institutions which should drive the process?
- What are the main issues to consider in institutionally promoting collaboration across architecture research in Scotland: internal drivers and external drivers and what are the interests of the core institutions?

### Notes:

- 
- <sup>1</sup> This discussion paper has been prepared for ScotMARK to consider at its first Steering Group meeting on 28<sup>th</sup> September 2005. The nature of possible "boundaries" for architecture research are discussed first, as these can lead to defining the scope for collaboration.
  - <sup>2</sup> These are the key components of architecture education as defined by the Architects Registration Board, although the cognate areas can be defined in different ways.
  - <sup>3</sup> Within these two subject areas, perhaps the most defining difference between architecture research and built environment research is the emphasis in the former on design, and the latter on physical science.