

Institution: The University of Edinburgh
Unit of Assessment: B7 – Earth Systems and Environmental Sciences
Title of case study: PUBLIC ENGAGEMENT WITH SCOTLAND'S CARTOGRAPHIC HERITAGE
<p>1. Summary of the impact</p> <p>Impacts: I) Enhanced public engagement with Scotland's cartographic heritage. II) Enhanced cross-sector collaboration around the use and digital delivery of historical maps.</p> <p>Significance and reach: A major synthesis of Scotland's map history sold >8,000 copies between publication in 2011 and April 2013 and was named 'Scottish Research Book of the Year' by the Saltire Society (2012). Three online map collections experienced 2008 – June 2013 access levels >50% higher than those for pre-2008. The newsletter of the Scottish Maps Forum (launched 2008), reached 553 individual subscribers and 117 institutional subscribers (January 2013).</p> <p>Underpinned by: Research into the mapping of Scotland from the late sixteenth century, undertaken at the University of Edinburgh (1996 onwards).</p>
<p>2. Underpinning research Numbered references relate to research outputs in Section 3.</p> <p>Key researchers The start and end dates of continuous employment in the School of GeoSciences, University of Edinburgh, are shown along with the most recent / current position of each researcher.</p> <p>Withers, Ogilvie Chair of Geography (1994 onwards) Grout, Project Co-ordinator for '<i>Charting the Nation</i>' (1999 - 2004) Forbes, Digital Imaging Officer for '<i>Charting the Nation</i>' (1999 - 2002) Harris and Haywood, Cataloguers for '<i>Charting the Nation</i>' (1999 - 2001 and 2001 - 2002)</p> <p>Research overview and context Research at Edinburgh led by Withers has addressed Scotland's mapping in an international context from the late sixteenth century to the present day, focusing upon the nation's cartographic evidence in relation to European mapping practices. The research has revealed the connections between mapping, modernity, and geographical knowledge in shaping Scottish national identity [1]. The research has shown how, from relative marginality before c.1550, Scotland became, by 1654, arguably the best mapped nation in Europe. The research has innovatively combined map and book histories to demonstrate mapping as an integral part of Scotland's self-representation [2,3]. This research has underpinned an award-winning synthesis of Scotland's cartographic history and led to wide-ranging impacts in web access, public benefit and specialist institutional management.</p> <p>Key research findings that underpin the subsequent impact The initial phase of the present work (1996 - 2001) focussed on the unique maps and texts of Timothy Pont (77 map items dating from the 1580s). '<i>Project Pont</i>' (hosted by the National Library of Scotland and undertaken by Withers in collaboration with Aberdeen, Dundee and St Andrews Universities) digitised these documents, allowing for the interpretation of the manuscript inks and identification of authorial provenance. Two studies published by Withers in 2001 used this analysis to place Pont's work in intellectual context [1,2].</p> <p>The second phase (1999 - 2004) focussed upon the '<i>Charting the Nation</i>' project, funded in part through the Research Support Libraries Programme. <i>Charting</i> targeted all Scotland's maps and related manuscripts for the period 1550–1740 (pre- and post-Pont and pre-Military Survey) in UK and non-UK repositories, including new research and digitisation for preservation and access. <i>Charting</i> provided new findings into map making and edition history; map makers' socio-political</p>

Impact case study (REF3b)

and intellectual networks and the role of mapping vis-à-vis national identity. *Charting* produced a website connecting the 3495 map images with high-level meta-data and DC/ISAD(G) cataloguing and demonstrated the significance of standards in digital cartographic analysis, as described in a 2006 publication by Withers and Grout [4].

The final and on-going phase (2004 onwards) focuses on significant milestones in Scottish map history. This work first addressed the 350th anniversary of Scotland's first 'atlas' (Blaeu's *Atlas Novus* (1654)), given Blaeu's role in publishing Pont's manuscript maps. In a 2005 publication Withers describes research on the reception history of the Blaeu *Atlas* [3]. Subsequent work has highlighted Scotland's 'Military Survey' (1747-1755) and examined atlases as a cartographic genre [5].

3. References to the research

Comments in bold give additional information on the quality of these outputs. The starred outputs best indicate this quality.

[1]* Peer-reviewed book, with a paperback edition in 2006

Withers, C. W. J. (2001a) *Geography, Science and National Identity: Scotland since 1520* (Cambridge University Press), ISBN-10: 0521642027, available upon request.

[2] Peer-reviewed book-chapter

Withers, C. W. J. (2001b) 'Pont in context: chorography, map-making and national identity in the late sixteenth century', in I. Cunningham (ed.), *The Nation Survey'd: Timothy Pont's Maps of Scotland* (Tuckwell Press with the National Library of Scotland), ISBN-10: 0859766802, available upon request.

[3]* Peer-reviewed journal article

Withers, C. W. J. (2005) 'Working with old maps: tracing the reception and legacy of Blaeu's 1654 *Atlas Novus*', *Scottish Geographical Journal* 121 (3), 297–309, DOI: 10.1080/00369220518737240

[4]* Peer-reviewed journal article

Withers, C. W. J. and Grout, A. (2006) 'Authority in space? Creating a web-based digital map archive', *Archivaria* 61, 27–46.

[5] Peer-reviewed book chapter

Withers, C. W. J. (2007) 'William Roy's World: Maps and Mapping in the Age of Enlightenment' in *The Great Map: The Military Series of Scotland 1747-1755* (Birlinn) pp 36-45, ISBN-10: 978-1841586670, available upon request.

A further metric of research quality is given by the peer-reviewed grants that have contributed to the preceding outputs:

- '*Delivering Pont: A User Needs Assessment for Marketing and Publication of the Pont Maps Digital Images Database*' (1998-1999), sponsor: Carnegie Trust Larger Research Award, value: £25k, awarded to Withers with a 5-institution consortium and in association with the National Library of Scotland.
- '*Charting the Nation: Preserving and Widening Access to Maps of Scotland, 1550–1740*' (1999–2002), sponsor: Research Support Libraries Programme (HEFCE-funded) and Scottish Cultural Resources Access Network, value: £242k, awarded to Withers with a 10-institution consortium (Edinburgh, plus the universities of Aberdeen, Cambridge, Dundee, Glasgow, Bodleian Library Oxford, National Library of Scotland, National Archives of Scotland, Royal Commission for the Ancient and Historical Monuments of Scotland, Royal Scottish Geographical Society). As the project developed, a further 13 institutions also became involved (Aberdeen City Archives, University of Copenhagen, Birmingham City Archives, Biblioteca Nacional de Espana, Bibliothèque Nationale de France, British Library, Guildhall Library London, Hatfield House Library, National Library of Ireland, National Maritime Museum, The National Archives, Worcester College Oxford, Drumlanrig House).

4. Details of the impact

Lettered references relate to corroboration sources in Section 5.

Enhanced public engagement with Scotland's cartographic heritage

Pathway: Communication of research findings to the public has occurred through:

- The publication in September 2011 of a highly successful book, *Scotland: Mapping the Nation*, for which Withers was co-author with Fleet (National Library of Scotland, NLS) and Wilkes, (Royal Scottish Geographical Society). The invitation for Withers to be involved stemmed from earlier roles, as author or consultant, in the publication of limited editions of facsimile atlases (2006 onwards) which represent the largest single theme publishing project in Scotland since 1945, as can be corroborated by the publishers of both works [A].
- The hosting of digitised map images on web-based resources associated with all three phases of the research [B] provided online resources for the public to access these maps.
- At the invitation of the NLS / Royal Soc. of Edinburgh, Withers gave a June 2008 public lecture '*Maps, Mapping, Map History*' to mark the 50th anniversary of the NLS Map Library.

Significance and reach:

- For three weeks in November 2011 *Scotland: Mapping the Nation* was the best-selling book in Scotland. The hardback edition (4,500 copies) sold out by June 2012 and a paperback edition appeared in August 2012, which had sold 3,800 copies by April 2013 as can be corroborated by the publishers [A]. The book has been widely acclaimed and was awarded 'Scottish Research Book of the Year' by the Saltire Society in November 2012 [C]. It was chosen by three leading geographical authors as one of the Scottish Books of the Year, selected expert reviews state '*a brilliant text*' and '*... a model of how to combine scholarship with popular reach*' and one public review states: '*Brilliant concept! Scotland will never appear quite the same shape again*' [D]. Coverage of the book featured on BBC News UK, BBC News Scotland, BBC Radio Scotland and in a dozen national newspapers. Invited lectures on the book have been given at seven national literary/scientific festivals.
- The websites associated with all three of the project phases, which contain online digitised map resources, have proven very successful. In particular, the *Project Pont* and *Blaeu* websites have experienced 15,000+ and 12,000+ per-annum hits respectively, for each year since 2008. These figures represent increases of at least 50% relative to the average pre-2008 levels, demonstrating their sustained and increasing popularity with the public.
- The '*Maps, Mapping, Map History*' public lecture was attended by over 330 people and was acclaimed as '*a significant triumph*' by the National Librarian and Chief Executive of NLS [E]. The NLS Senior Map Curator also said: '*splendid lecture . . . inspiring and coherent. . . . posterity will look back on the productivity of the 1990s and 2000s and see this period as a golden age for map history in Scotland, and you have played a large part*' [F].

Enhanced cross-sector collaboration and improved institutional standards

Pathway: Withers has been involved in a range of activities that have promoted cross-sector (HEI, non-HEI and public) collaboration on Scotland's map heritage. Prompted by Withers' research, in 2008 the NLS established the Scottish Maps Forum [G] to disseminate news of research initiatives and public meetings via its newsletter *Cairt*. The research has also demonstrated high standards of practice in the cataloguing and management of historical map collections.

Significance and reach:

- From an initial circulation of c.100, the January 2013 issue of *Cairt* reached 553 individual and 117 institutional subscribers. Four Scottish Map Forum public meetings were held over the period 2008 - 2012, themed on 'mapping and urban history', 'mapping, military cartography and antiquities'; 'transport, communications and cartography' and 'map publishing', attracting audiences of between 78 and 120 public and curatorial expert participants. All of these figures can be corroborated by the NLS Senior Map Curator [F].
- The *Charting the Nation* project led to the adoption of cataloguing standards (MARC1 / AACR2) beyond industry norms by five of the partner institutions, including the Bodleian

Library, NLS and Royal Scottish Geographical Society. The impact of Withers' research on shaping practice in map libraries has been affirmed by the NLS Senior Map Curator [F].

- In July 2010, with Withers' involvement, the NLS's management of the Pont maps was recognised by its inclusion in the UNESCO Memory of the World heritage listing [H].

5. Sources to corroborate the impact

Where two web-links are given, the first is the primary source and the second an archived version.

[A] Managing Director, Birlinn Publishers

Fleet, C., Wilkes, M., and Withers, C. W. J. (2011) *Scotland: Mapping the Nation*, Birlinn Press in association with the National Library of Scotland, 336 pp, ISBN: 978-1841589695.

Can provide corroboration of the sales figures for the above book, in particular that the hardback edition (4,500 copies) sold out by July 2012 and the paperback edition had sales of 3,800 as of April 2013. Can also provide corroboration of Withers' involvement with the facsimile atlases and that this lead to the *Scotland: Mapping the Nation* authorship invitation.

[B] Project websites for Project Pont, Charting the Nation and Blaeu

Project Pont: <http://maps.nls.uk/pont/index.html> or <http://tinyurl.com/B7-13-S5-B1>

Charting the Nation: <http://www.chartingthenation.lib.ed.ac.uk/> or <http://tinyurl.com/B7-13-S5-B2>

Blaeu: <http://maps.nls.uk/atlas/blaeu/> or <http://tinyurl.com/B7-13-S5-B3>

Provides corroboration of the web-hosting of digitised maps through the research. The web-traffic data quoted in Section 4 was gathered from the sites annually from inception to 2012. Sample data for the *Blaeu* and *Pont* sites for the year from September 2010 is available upon request.

[C] Publishing Scotland: Saltire Book Awards winners 2012 (30 November 2012)

<http://tinyurl.com/B7-13-S5-XC> or <http://tinyurl.com/B7-13-S5-C> Corroborates the award of 'Scottish Research Book of the Year' 2012 to *Scotland: Mapping the Nation*.

[D] Critical and public acclaim for *Scotland: Mapping the Nation* (September 2011 - 2012)

<http://tinyurl.com/B7-13-S5-XD1> or <http://tinyurl.com/B7-13-S5-D1>

Excerpts from reviews by *Sunday Herald*, *Journal of Historical Geography*, *Mail on Sunday* and *Times Educational Supplement*, corroborating the acclamation statements given in Section 4.

<http://tinyurl.com/B7-13-S5-XD2> or <http://tinyurl.com/B7-13-S5-D2>

Selection as Book of the Year by three leading experts is given on the *Herald Scotland* website.

<http://tinyurl.com/B7-13-S5-XD3> or <http://tinyurl.com/B7-13-S5-D3>

Public reviews on Amazon.co.uk page (average rating 4.8/5), corroborating the quoted excerpt.

[E] National Librarian and Chief Executive, National Library of Scotland

Can corroborate the statement regarding the success of the 'Maps' public lecture and also the wider benefit of the research and impact to specialist institutions within the UK and overseas.

[F] Scottish Maps Forum Website: Events Page

<http://tinyurl.com/B7-13-S5-XF> or <http://tinyurl.com/B7-13-S5-F>

Corroborates that the Maps Forum was established as a result of Project Pont and the occurrence of the four stated public events, which have enhanced cultural understanding.

[G] Senior Map Curator, National Library of Scotland

Can corroborate the statement regarding the success of the 'Maps, Mapping, Map History' public lecture given by Withers on 23rd June 2008 and the quoted attendance figures for the Maps Forum events. The Senior Map Curator has also provided a factual statement on the impact of Withers' research on institutional practice within national and other map libraries, including the NLS.

[H] UK Memory of the World Register (July 2010)

<http://tinyurl.com/B7-13-S5-XH> or <http://tinyurl.com/B7-13-S5-H>

Provides evidence of the inclusion of Pont Maps into the UNESCO 'Memory of the World' heritage listing (Page 6), following the involvement of Withers with the NLS.