

Hutchinson, John Alexander (2020) *The Rock and The Map: two tales of contemporary heritage landscaping in Scotland.* PhD thesis.

https://theses.gla.ac.uk/79003/

Copyright and moral rights for this work are retained by the author

A copy can be downloaded for personal non-commercial research or study, without prior permission or charge

This work cannot be reproduced or quoted extensively from without first obtaining permission in writing from the author

The content must not be changed in any way or sold commercially in any format or medium without the formal permission of the author

When referring to this work, full bibliographic details including the author, title, awarding institution and date of the thesis must be given

Enlighten: Theses
https://theses.gla.ac.uk/
research-enlighten@glasgow.ac.uk

The Rock and The Map: two tales of contemporary heritage landscaping in Scotland

John Alexander Hutchinson

Abstract

As opposed to the ingrained and popularly rehearsed notion that Scotland's quintessential landscapes are mountainous, remote, rugged and wild, this thesis considers the local landmarks of Dumbarton Rock and the Great Polish Map of Scotland as exemplary of a "New Scottish Landscape". That is, a new aesthetic, or 'way of seeing' the Scottish landscape as one defined by 'everyday' local landscapes of affiliation, as much as the 'special' and spectacular. Such a belief is given added traction with the demographic fact that the majority of Scotland's population inhabits the densely urbanised Central Belt, in which landscape qualities of 'wildness' and 'remoteness' are generally lacking. Despite this 'grandeur deficit', there is increasing recognition that exurban, post-industrial, partially degraded or abandoned landscapes have the capacity to generate intensities of belonging and attachment, reflecting new, distinctive heritage values.

Aligned with 'processual' conceptual understandings of landscape and heritage as situated, subjective phenomena, 'the Rock' and 'the Map' are approached in this thesis as instances of "heritage landscaping", whereby landscape and heritage are figured as conjoined; emerging and unfolding together in practice and experience. Informing a phenomenological methodological design around fieldwork principles of observation, sensation, practice and performance, a range of research materials are gathered to tell the stories of the Rock and the Map. Recounted in two central empirical chapters, the Rock and the Map are explored respectively through the provision of a historical-cultural biography, lending context and time-depth to my own situated experiences through participative intervention.

As contrasting but related instances of community-driven heritage landscaping, the Rock and the Map are then considered together to critically engage with recent conceptual developments in landscape and heritage practice towards 'democratisation'. That is, a loosening of traditionally top-down professional landscape and heritage decision-making, to better account for the often intangible 'social values' held by 'unofficial' local communities of interest. Drawing upon my situated inquiries of the Rock and the Map, I contend that landscape phenomenology and a 'performative ethos' provide a creative and effective means of apprehending and accounting for these alternative narratives, allowing us to uncover and illuminate the latent potential and cultural value held within the New Scottish Landscape.

Table of Contents

Abstract	ii
Table of Contents	iii
List of Figures	V
Acknowledgements	vii
Author's Declaration	viii
1. Introduction: Scottish Landscapes Ol	d and New 9
2. Literature Review	21
The landscape of cultural geography	23
Landscape and performance	26
Performing geographies	29
Summary	37
Landscape in policy and practice	38
Introducing heritage: a critical consideration	on44
Heritage: from object to process	45
Community heritage	51
Social value	53
Digital heritage	56
Summary	57
3. Methodology	59
4. Physical Graffiti: Heritage Landscapi	ng at Dumbarton Rock74
Introduction	74
Part I: Rock of Ages	79
A capsular history of Dumbarton Rock	79
A social history of rock climbing at Dumb	arton Rock90
Heritage landscaping at Dumbarton Rock.	108
The climbing landscape-as-text	109
The 'Winfield guide'	114
Interlude: landscape-as-body	128

Part II: The Rock as a Landscape of Ritual and Performance	131
Edgeland escape	132
Technology: the hybrid climbing assemblage	139
Post-phenomenology	144
Graffiti and heritage	146
The ACCORD project	154
Performative intervention: lighting lines at Dumbarton Rock	159
Conclusion	173
5. Mapa Szkocji – The Great Polish Map of Scotland	176
Introduction	176
Part I: Origins	180
Inception	180
Construction	187
Ruination: the state of the nation	196
Hiatus: hinterland	203
Part II – Reclaiming the Future	210
Nation building: the restoration of the Great Polish Map of Scotland	210
Heritage landscaping: 'the concrete garden'	221
The Map as monument	232
Landscape and nation	239
Conclusion	250
6. The Rock and The Map: Conclusion	253
Appendices	262
Appendix 1: Climbing grade table	262
List of References	264
Other Sources	

List of Figures

Figure 1: The Five Sisters shale bings, West Calder	11
Figure 2: St Peter's Seminary, Cardross	13
Figure 3: The sculpted concrete boulders of the Cuningar Loop Woodland Park	15
Figure 4: A drone's eye view of Dumbarton Rock from the north-west	74
Figure 5: The Town of Dumbarton by I. Clark, 1824	79
Figure 6: Their Majesties' Castle of Dumbarton from the West	84
Figure 7: Landing of Queen Victoria at Dumbarton in 1847, Hope James Stewart	86
Figure 8: Queen Victoria's pencil drawing of Dumbarton Rock	86
Figure 9: Dumbarton Rock and surrounding industry, 1979	89
Figure 10: Brian Shields 'free-climbing' Windjammer Crack, 1963	94
Figure 11: Neil MacNiven climbing Chemin de Fer	95
Figure 12: Steve Belk climbing the boulder problem Narcosis	97
Figure 13: Dave 'Cubby' Cuthbertson on the first free ascent of Requiem	
Figure 14: Andy Gallagher climbing the 'highball' boulder problem of Royal Arete	102
Figure 15: 'Dumby' Dave MacLeod 'working the moves' on <i>Pressure</i>	104
Figure 16: Visiting Canadian climber Sonnie Trotter falling from <i>Rhapsody</i>	107
Figure 17: 'Topo' of the Home Rule Boulder and its boulder problems	111
Figure 18: Guidebook description of the 'highball' boulder problem of The Whip	113
Figure 19: Excerpt from Gary Latter's copy of The Glasgow Outcrops Volume II	113
Figure 20: Topo of the Rock's boulders and main face, Winfield guide	117
Figure 21: Boulder A (Eagle Rock), Winfield guide	118
Figure 22: Boulder D, Winfield guide	119
Figure 23: Boulder F, Winfield guide	120
Figure 24: The inscription of the Rock's main north-west face in the Winfield guide	122
Figure 25: Graded list of boulder problems, Winfield guide	123
Figure 26: Graded list of routes, Winfield guide	124
Figure 27: Brian Shields on Ganglion Grooves	126
Figure 28: Brian Shields aid-climbing Requiem	127
Figure 29: The author on a repeat ascent of <i>Toto</i>	134
Figure 30: The view north-west from the Rock towards Dumbarton and Ben Lomond	135
Figure 31: Alan Cassidy on the near horizontal terrain of <i>Hokku</i>	142
Figure 32: Graffiti at the Rock, 2008	146
Figure 33: Chris Everett climbing <i>The Shield</i>	148
Figure 34: Dave 'Cubby' Cuthbertson climbing the boulder problem <i>Home Rule</i>	
Figure 35: Image of 3D model of the Sea Boulder created with photogrammetry	156
Figure 36: The practice of night bouldering	161
Figure 37: Friar's Mantle, Neil MacNiven, 1963	166
Figure 38: Walking the well-trodden pathway between boulders	166
Figure 39: Impostor Arete, Neil MacNiven, 1963	
Figure 40: Hard Cheddar, Neil MacNiven, 1963	167
Figure 41: The iconic face and historic graffiti of the <i>Pongo</i> boulder	
Figure 42: The looming and luminous north-west face	
Figure 43: <i>Home Rule</i> , the River Clyde and the lights of Port Glasgow	

Figure 44: Home Rule in thickening darkness	169
Figure 45: The Blue Meanie, 1970s	170
Figure 46: The well-worn descent from the Eagle Boulder	170
Figure 47: Sucker's Boulder	171
Figure 48: The Eagle Boulder wrapped in a rainbow of light	171
Figure 49: The Mugsy face lit as a historic monument	172
Figure 50: The Home Rule face lit as a historic monument	172
Figure 51: The Great Polish Map of Scotland	176
Figure 52: Jan Tomasik on a building site in Krakow	180
Figure 53: General Stanislaw Maczek and the 1st Polish Armoured Division	
Figure 54: Catherine Kimlin and Jan Tomasik on their wedding day, September 1942.	182
Figure 55: Scale model of Belgium at the Brussel's World Expo	185
Figure 56: Dr Kazimierz Trafas and Roman Wolnik	187
Figure 57: Bartholomew Survey Maps of Scotland	189
Figure 58: Roman Wolnik and Zygmunt Olecki	192
Figure 59: Marek Raton, Roman Wolnik, Zygmunt Olecki and Janusz Szewczuk	192
Figure 60: The map being 'whitewashed', circa 1976-77	
Figure 61: The Map in 'ruin', 2011	
Figure 62: The shattered landscape of the Map in 2014	200
Figure 63: The maker's mark	
Figure 64: Old cans from the hotel kitchens exposed by the map's degradation	201
Figure 65: Polish Consul General Dr Tomasz Trafas	
Figure 66: Nick Macdonald during early clean-up work in 2012	
Figure 67: Replacing the Map's old pipework on challenging terrain	
Figure 68: Topographic re-sculpting on the Isle of Lewis, March 2017	
Figure 69: The painting of the map by Polish contractors Polwork UK	220
Figure 70: The pastoral view of the Scottish Border landscape	
Figure 71: The Map's sprawling concrete topography	
Figure 72: Repairs worked into surrounding topography	227
Figure 73: Repairs on the Mull of Kintyre	
Figure 74: The material milieu of the Map	
Figure 75: The Map from the perspective of the author in miniature	
Figure 76: The "taskscape" of a typical working party at the Map	
Figure 77: Invitation for the formal opening of the Great Polish Map of Scotland	
Figure 78: The official opening of the Great Polish Map of Scotland	
Figure 79: General Stanislaw Maczek statue, Edinburgh	
Figure 80: Screengrab of the digital version of the Great Polish Map of Scotland	
Figure 81: Visitors gathered at the Map's viewing tower	
Figure 82: The sculptural qualities of the Map	
1 iguic 62. The sculptural qualities of the Map	∠+/

Acknowledgements

Firstly, I would like to express my gratitude to Professor Hayden Lorimer. Not only for acting as my supervisor throughout the PhD, but for encouragement, support and intellectual inspiration harking way back to my undergraduate years. Thanks too, to my secondary supervisor, Dr Simon Naylor, for his diligent advice and guidance. I couldn't have asked for a better pairing. I would also like to thank all the staff, students and my colleagues at the University of Glasgow's School of Geographical and Earth Sciences for nurturing such a collegial and friendly department.

I am indebted to the rock climbing community of Dumbarton Rock and to those who gave their time to share personal memories of the place. It's a privilege to be able to contribute in some small way to the recognition of a unique sporting heritage. Huge thanks also to Keith and the volunteers of Mapa Scotland for welcoming me as one of the team. I'm proud to have been a part of such a remarkable and truly valuable project. Thanks to Tomasz, Janusz and Malgosia for helping to make my trip to Krakow as productive as it was enjoyable.

I'd also like to thank Grant, for being a great friend, flatmate and fellow PhD traveller during our time at 119 Randolph Road; Chris and Ry, for helping me to realise my vision of lighting up Dumbarton Rock's climbing heritage, and all of the team at TCA Glasgow for the camaraderie. Really, the number of friends who have helped me throughout the PhD are too many to name, you know who you are, and I thank you all.

A special thanks to my family. Being the youngest of six siblings is a source of immeasurable strength and support. A heartfelt gratitude for this and for everything else, to my wonderful parents, David and Caroline.

Lastly, I'd like to thank Rebecca - for her love, patience, good humour, support, and of course, all the mountain adventures. Not many people would figure the final year of their PhD as one of the best of their lives, but you've made it that way.

Author's Declaration

I hereby declare that, except where explicit reference is made to the contributions of others, this dissertation is the result of my own work and has not been submitted for any other degree at the University of Glasgow or any other institution.

Signature:....

Printed name: John Hutchinson

1. Introduction: Scottish Landscapes Old and New

As with any nation seeking to evidence its 'existence' as one transcending the collective experience of its inhabitants, notions of landscape and heritage are integral to the 'grand narrative' of Scotland. As Harvey notes:

...a cultural memory of 'national past' is literally con-joined with specific iconic topographical reference points in a taken-for-granted, self-fulfilling and mutually supporting sense of heritage landscape. At once, both emblematic of the imagined community of the nation, as well as the solid entity of the nation-in-physical-form, the double meaning of 'country' is celebrated through a sense of heritage as a contemporary product perceived through notions of the past (2015: 911).

In the collective consciousness of Scotland, it is the rugged, mountainous landscapes of the Scottish Highlands that represent the nation in emblematic and material form (Withers 1992). Removed from the humdrum of urban existence, it is in the Highlands that the authentic Scotland is to be found. Just such a message is perpetuated by Scotland's tourist industry, with VisitScotland proclaiming that "The raw wilderness of the Highlands is truly the Scotland of your imagination". The potency of this message is evidenced by the 534,000 international tourists and 2 million domestic tourists who visited the Highlands and Islands in 2017, to see, smell, taste, and *experience* its ostensibly unspoilt wilderness.² Though this perception of the Highlands as the nation's cultural hearth and home is largely imaginary in conception and contemporary circulation, it is also symbolically powerful. As Withers (1992: 143) observes 'The Highlands are both real – an area of upland, geologically largely distinct from the rest of Scotland – and they are a myth, a set of ideologically laden signs and images". Such is the potency of the Highland myth that in debate and discussion regarding the management of the Scottish landscape, it is a de facto assumption that it is the 'special' Highland landscape that is under discussion. Recent controversy over the proposed construction of several hydroelectric power schemes in Glen Etive, illustrates the continued primacy of the Highland landscape within the national consciousness and its ability to raise impassioned debate.³

Celebrated as wilderness *and* as cultural hearth (MacDonald 2013), Scotland's essentialised Highland landscape does much to obscure a "motley assortment" of *other* heritage landscapes (Lorimer 2013), which are themselves replete with cultural meaning, significance and association. Though only "small stories" (Lorimer 2003) in comparison to the 'grand

narrative' bequeathed to the Highlands, these *other* heritage landscapes offer compelling insights into the quotidian processes of place-making by which Scotland's majority urban population make sense of their surroundings. Reflective of the twenty-first century realities of a post-industrial Scotland, many of these landscapes are defined by episodes of neglect and ruin, leaving them open to reinvention and renewal. We might consider this varied patchwork of landscapes cumulatively as the "New Scottish Landscape", mindful of Worpole and Orton's (2013) provocative re-configuring of a contemporary English landscape aesthetic as one characterised by absence and liminality in its coastal margins, as opposed to the inner rural idyll.

Worpole describes the "new English landscape" as "an imaginative construct, a personal attempt to meld together historic, aesthetic and ecological elements around the issues of habitat, landscape and sense of place which have been in play in Britain since the end of the Second World War" (2013: 9). Though an imaginative and aesthetic project (evoked visually via Orton's abstract photography), Worpole's new English landscape is a political one, resisting "lofty statements on the true and the beautiful" in favour of "the particularities and historical complexities of local and regional topographies" (2013: 10). By unsettling binary cultural distinctions between the natural and cultural, countryside and town, beautiful and ugly, local and global; for Worpole, the ambiguous, exurban landscape aesthetics of East Anglia evoke the contemporary realities of England in a globalised world, conspicuous by their absence from the essential, 'timeless' narratives associated with the inner rural idyll. As Worpole contends, a reappraisal and "full discussion" of contemporary landscape aesthetics "offers a rare opportunity in which social and environmental imperatives could be reconciled in a 21st century politics of place" (2013: 12).

With such potentialities in mind, in the New Scottish Landscape, hybridity, messiness, complexity, everydayness and localism are celebrated, with the scope of what constitutes a meaningful landscape broadened significantly. Three introductory vignettes of landscape practice - two of which have run concurrent with my own place-based inquiries and activities - further frame my critical understanding of the New Scottish Landscape. All located within the nation's highly populated Central Belt and shaped by processes of ruin, renewal and reinvention, these sites resist the cultural tendency to figure the Highlands as the essential and exemplary Scottish landscape.

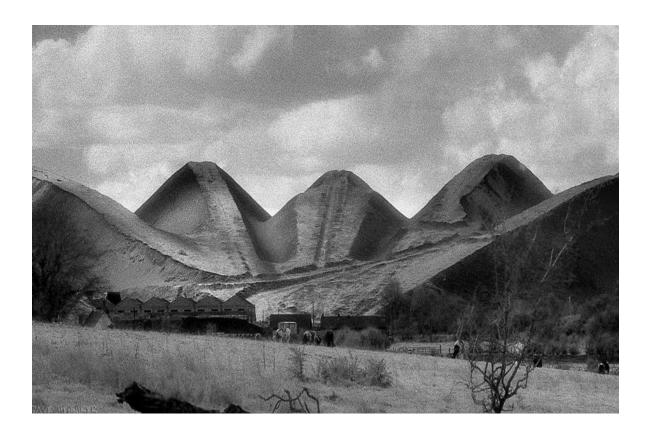


Figure 1: The Five Sisters shale bings, West Calder (*Image: David Benniker*)

The first of this trio of vignettes is the post-industrial landscape of remediated shale 'bings' of West and Midlothian, which have gradually transformed from waste site to land-art to altmonument, existing both as "process sculpture" and bio-diverse leisure landscape (Richardson 2012). Rising to a height of 95 metres in places, the imposing Greendykes Bing near Broxburn and the Five Sisters bings of West Calder (see Figure 1) are familiar landmarks for the average Scotrail commuter shuttling between Glasgow and Edinburgh. Though a passing glance at the bings may register in the mind as natural landmarks, these heaps of burnt and oxidised waste are the by-product of a mid-nineteenth century mining process of shale oil extraction via a heating method known as 'retorting'. By the mid-1860s over a half a million barrels of crude shale oil were being produced in this manner, with two barrels of crude oil producing one ton of shale waste (Richardson 2012). The West and Midlothian shale oil industry provided significant employment in the region for generations with industrial towns and infrastructure growing exponentially to supply the mines with labour and materials. The eventual arrival of cheaper oil imports from the Middle East signalled the gradual decline of the industry, with mines closing between the 1920s up until the 1960s (Richardson 2012).

While the infrastructure of Midlothian's shale oil industry all but disappeared during this decline, the bings remained as monumental testaments to its former presence, as well as the excessive waste and ultimate inefficiency of the industry's process. Troubled by the visual impact of the bings, in 1975, the Scottish Development Agency sought the advice of artist in residence John Latham in seeking a creative solution to their future. Latham's proposal was for a new way of seeing Midlothian's bings, not as piles of spoilt waste, but as a "process sculpture" (Richardson 2012). Though Latham's proposal to re-purpose a series of bings into a sculpture he termed *Niddrie Woman* ultimately never materialised, his conceptualisation initiated ideas within policy circles for their conservation, prior to any legal mechanisms for the protection of post-industrial heritage (Richardson 2012). While many of the region's nineteen bings have since been quarried for building material, the Greendykes Bing and Five Sisters bings are now protected as Industrial Heritage Sites. As well as providing a local landscape of leisure for surrounding residents, their rusty-red slopes also provide a haven of biodiversity, with 86 plant species recorded on Greendykes Bing such as wormwood, creeping buttercup and the common spotted orchid flourishing in their alkaline 'soil' (Jack 2013). In their gradual transformation from industrial waste to bio-diverse memorial landmarks, Midlothian's bings are emblematic of the New Scottish Landscape, where the material remains of post-industrial decline - and its absences - can be re-valued, re-imagined and re-purposed for contemporary needs.

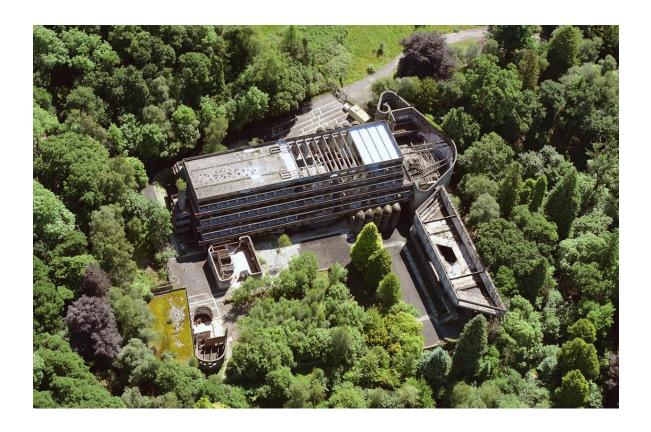


Figure 2: St Peter's Seminary, Cardross (Image: NVA)

The second of my landscape vignettes can best be labelled 'post-spiritual', and concerns efforts to recuperate and reoccupy St Peter's Seminary, an internationally recognised Modernist architectural ruin located near the village of Cardross within the historical landscape of the Kilmahew Estate (see Figure 2). Originating in the thirteenth century with the Lairds of Napier and passing through the hands of various family dynasties, the estate eventually came into the possession of the Catholic Church in 1948 who were attracted by the secluded nature of its landscape and its ancient religious geography (with the name Kilmahew being derived from the Gaelic 'cille', meaning a small settlement of monks).⁴ Designed by Isi Metzstein and Andy MacMillan of the Glasgow based architectural practice Gillespie, Kidd and & Coia and completed in 1966, the bold, sculptural design of St Peter's appeared as an almost otherworldly presence within the genteel, landscaped estate of Kilmahew and its nineteenth century baronial mansion, Kilmahew House (Lorimer 2016). However, a decline in the number of men entering the priesthood combined with the unsuitability of its 'continental' design to cope with the wet Scottish climate, served to undermine the solid physicality and function of St Peter's, leading to its eventual abandonment in 1980 - a mere 14 years after its construction (Lorimer 2016). Despite architectural status as an internationally renowned example of Brutalism, since its early

abandonment by the Catholic Church, St Peter's became a place of neglect - its interiors looted, vandalised and destroyed during feral repurposing as a place of illicit revelry and youthful recreation.

Having seemingly been locked into a trajectory of terminal decline, St Peter's was subject to an ambitious and audacious rescue operation by the public arts organisation NVA, which building upon the experimental activities of 'The Invisible College' (Gallagher 2014), sought to reinvent and partially restore the modern ruin and its surrounding landscape to become a site for creative practice and public conversation.⁵ NVA succeeded in securing significant public funding to realise the early stages of their plans, with contractors clearing the ruin of decades of rubble as well as stabilising its concrete superstructure. The creative potential of St Peter's was showcased by NVA through a carefully staged representation of the site, *Hinterland*, which ran for a four-week period in 2017.⁶ A performative and participative landscape-scale event, *Hinterland* utilised light and sound design to bring the building dramatically 'back to life' and reignite a series of historic design correspondences between landscape scenery and built form (Lorimer 2016). Though NVA was ultimately overwhelmed by the considerable challenges and scale of the project in 2018,⁷ the creatively ambitious vision for St Peter's-Kilmahew illustrates the continued potential (as well as significant challenges) for 'dead-end' ruined landscapes to be reanimated and reimagined through imaginative forms of contemporary salvage.



Figure 3: The sculpted concrete boulders of the Cuningar Loop Woodland Park (Image: Chris Watt)

The third introductory landscape vignette is the re-materialisation of popular landscape experience at the Cuningar Loop Woodland Park in Glasgow, an area opened to the public in the autumn of 2015. A former "edgeland" (Farley & Symmons Roberts 2011) site tangled up in Glasgow's longer-term civic history, from the early to mid-nineteenth century water from the River Clyde was pumped into reservoirs at the Loop to supply drinking water to the city. With these waterworks eventually superseded by the completion of the Loch Katrine Water scheme in 1860, the Loop was subsequently used for quarrying and mining. In the 1960s, it became a landfill site for the dumping of waste from the demolition of tenement buildings in the Gorbals area of Glasgow. 8 Having existed as an informal urban common for decades, the Loop was regenerated as a £5.7 million 'Legacy 2014' project, derived from the 2014 Commonwealth Games held in Glasgow. Delivered by the Forestry Commission, the regeneration of the Cuningar Loop saw the planting of 15,000 trees and the construction of pathways to provide a habitat for wildlife and a new recreational landscape for the area.⁹ The Loop is also a space for public art - with the 'Cuningar Stones' (sandstone blocks recovered from the dumping of demolition material from the Gorbals in the 1960s), carved with imagery to represent the "complex social, industrial and natural history of the site".¹⁰

A major and novel component of this fabricated leisure landscape is Scotland's first outdoor 'bouldering park' composed of a series of artificial boulders constructed from sculpted concrete (see Figure 3). The tender to create the boulders was secured by Serious Climbing, a Cardiff based company specialising in the design and manufacture of indoor climbing holds. The boulders are designed to mimic the sandstone boulders of the world-famous climbing destination of Fontainebleau, France, with sprayed concrete being shaped and sculpted to resemble the natural forms and features typical to the rock type. The experimental design of the boulders and their success in fabricating a small part of Fontainebleau in the East End of Glasgow, were duly recognised in the 2015 Concrete Society Awards, with judges stating:

This is an excellent initiative and the overall impact of the constructed boulders is very impressive, with the different shapes being created to give a genuine interpretation of real rock formations...The concrete boulders complement the surroundings in terms of appearance and encouraging people to participate. The boulders are very striking due to their artistic intervention and are sculptures in their own right...the client has been rewarded with a facility that not only integrates into the surroundings but also should stand the test of time and give years of enjoyment to the people of Glasgow.¹¹

As well as encouraging participation from individuals who may have otherwise had no exposure to the outdoor pursuit of bouldering, the Cuningar Loop's boulders have also been embraced by the city's established climbing community as a convenient, accessible and 'introductory' outdoor bouldering venue.¹² Echoing the inventive remediation of the industrial landscape of Landschaftpark Duisburg-Nord to include bolted climbing routes up its walls and towers in an area known as the Klettergarten (the climbing garden),¹³ the choice of bouldering as a successful component of the Cuningar Loop's recreational landscape illustrates the potential for embodied performance and design practice to be incorporated into the fabrication of the New Scottish Landscape.

Pictured and narrated in brief, these three vignettes illustrate the regenerative capacity to be found in what otherwise might be considered as marginal, ruined or washed-out landscapes, with vacancy, absence and dereliction providing space for new ways of approaching both landscape and heritage in Scotland. If the place-based inquiries that I have undertaken and which are reported in this thesis differ in scale and scope to the examples cited above, they are informed by, and in tune with, the democratic ethos and aesthetic of the New Scottish Landscape, where all manner of regional places and objects are deemed worthy of sustained scrutiny, aesthetic appreciation and critical consideration.

As well as an aesthetic, artistic preference for seeking out the alternative, calls for something akin to a New Scottish Landscape are evident in policy circles too. Influenced by the overarching 'democratic' ideals of the European Landscape Convention (ELC) in opening up processes of landscape management to the populations that live within them (Council of Europe 2000), an 'all landscapes' approach has taken root in the rhetoric of Scotland's professional landscape bodies too. For instance, the Scottish Landscape Forum (a coalition of various governmental and non-governmental bodies) states that "town or country, 'beautiful' or 'degraded', every landscape is part of our shared inheritance" (2007: 8). Implicit within the ELC's definition of landscape as "an area, as perceived by people, whose character is the result of the action and interaction of natural/ and or human factors" (Council of Europe 2000: 2), is the recognition that individual, subjective perceptions form a key aspect of how landscape 'operates'. As the Scottish Landscape Forum state, "landscape...encompasses all the physical elements of the environment that surrounds us but it is people's experiences and perceptions that turn surroundings into landscape." (2007: 7). With this commitment to the importance of individual perception in the landscape process, comes the requirement to better apprehend, understand and account for the subjective experiences that underpin these perceptions, particularly of those people who live within the landscape in question. This shift in landscape policy away from universal, aesthetic values towards a more nuanced, poly-vocal approach is one informed and inflected by "processual" (Harvey 2015) academic understandings, with a range of associated qualitative and creative research methodologies providing novel means of accessing the phenomenological basis of landscape experience (Wylie 2013).

Harvey considers landscape and heritage as "mutually supporting" conceptual developments (2015: 911), with the shift in landscape thought from 'object to process' occurring in-tandem

with a newly critical form of heritage studies that seeks to go beyond a traditional concern with the objects of heritage, to consider heritage *itself*, as a sociocultural, "politicized and contested" process, rather than "a static set of objects with fixed meaning" (Avramie et al 2000: 6). In the heritage arena too, there is an increasing concern with opening up the heritage process to account for the alternative "social values" that individuals and communities attach to the historic environment, with "practice and experience" recognised as the locus of meaning-making (Jones and Leech 2015: 34). With the recognition that practices of landscape are integral to the heritage process and vice-versa - that the past is always present in the experience of landscape (Harvey 2015), it is productive to approach the two concepts as part of the same process of meaning-making – one which I have termed "heritage landscaping".

'The Rock' and 'The Map'

It is within the varied patchwork of the New Scottish Landscape that I place my own situated inquiries of two revelatory sites, and their "tellable tales" (Lorimer 2011: 269) in the contemporary heritage landscaping of Scotland; namely 'The Rock', and, 'The Map'. Through these sites, I want to consider critically the 'new processual paradigm' in landscape and heritage studies, suggesting new forms of practice that are more attentive to the 'alternative' values held by the varied communities of interest who are currently shaping the New Scottish Landscape.

The Rock' is Dumbarton Rock, a designated heritage site enshrined in law as a Scheduled Ancient Monument of National Importance due to its long history as a defensive site. Its protection is the statutory responsibility of Historic Environment Scotland (HES). The Rock's north-west face is also the favoured playground for a thriving rock-climbing community that lays claim to a lively, unofficial local history of affiliation, with the Rock playing a key role in the development of Scottish rock climbing since the mid-1960s. On occasion, cultures have clashed over how the Rock should be respected and protected, raising compelling questions on how to apprehend and value the largely intangible heritage of its climbing community alongside its "authorized heritage discourse" (Smith 2006).

'The Map' is the 'Great Polish Map of Scotland', a landscape folly located in the grounds of the Barony Castle Hotel in the Scottish Borders. Measuring 50 metres by 40 metres, this unique concrete relief map of Scotland was constructed in the mid-1970s by a team of Polish geographer-cartographers to commemorate the wartime contribution of Polish soldiers stationed in Scotland during World War II. Later neglected, the relief map fell into disrepair, only being recently rediscovered. The 'MAPA Scotland' group, a community-led initiative, took ownership of the Map and set about campaigning for its renewal and restoration. A remarkable feat of modelling, engineering and sculptural cartography at the time of its construction, today the model of a country-in-miniature has been reinvented to symbolise Scotland's dynamic cultural heritage, illustrating the processes of "heritagisation" (Klekot 2012) by which objects are accorded historical value by the meanings and narratives attached to them in the present.

Though contrasting in nature, as an analytical pairing the Rock and the Map offer compelling examples of contemporary heritage landscaping in Scotland. Through these sites, I seek to challenge traditional aesthetic idealisations of Scotland's landscape, and consider cultural alternatives that reflect differing social values and shifting ideas of heritage. I also consider how new modes of landscape encounter (observation, sensation, practice and performance) can reconfigure the standard approach taken to debates about Scotland's landscape heritage that have tended to prioritize textual and visual forms of representation. As Harvey states, "With both heritage and landscape studies, elements of contingency and context are crucial and provide an imperative that we both interrogate how the world is represented and acknowledge affective properties that lie beyond, or behind, standard modes of representation (Harvey 2015: 912). Through my place-based inquiries of the Rock and the Map then, I seek to address three specific research questions:

- 1. By challenging traditional idealisations of the Scottish landscape, what cultural opportunities does the New Scottish Landscape present?
- 2. How do 'unofficial' communities of interest set about making meaning from surrounding historic environments?
- 3. What do the Rock and the Map illustrate with regards to the 'nature' of landscape and heritage?

Thesis Structure

The structure of this thesis pivots around my situated inquiries of the Rock and the Map. Initially, in Chapter 2, I provide conceptual context to my research in the literature review, where I consider the recent trajectories of landscape and heritage (from the perspective of cultural geography) towards the phenomenological, performative and processual understandings underpinning my own conception of heritage landscaping. I also consider landscape and heritage as each concept is understood and applied in relevant policy contexts. Chapter 3 outlines my methodological approach and explains its site-specific design. The central empirical chapters of the Rock and the Map, 4 and 5, are each split into two parts. Part I broadly considers the past of each place through the provision of a historical-cultural geography, while Part II considers their present and ongoing lives as two instances of heritage landscaping. In the thesis' conclusion I draw the two sites in comparison to consider their differing 'outcomes' as well as the manner in which they can contribute to an ongoing critical conversation regarding the nature and practice of landscape and heritage.

2. Literature Review

This thesis uses two critical concepts, 'landscape' and 'heritage' as structuring devices. Though ostensibly describing two different phenomena, in practice, landscape and heritage can operate in relation, with landscape providing the material (and ideological) substrate in which heritage and memory is often nurtured. As Wylie states "a series of critical questions connect cultural landscapes up with memorial and heritage politics - at the most basic level, what is remembered and why?" (2007: 191). Though the configuration of landscape and heritage as relational, and on occasion co-constitutive, is a long-standing one, the "sustained academic scrutiny" both have been subjected to in recent years, as well as an upsurge in popular interest (via 'new nature writing' and heritage-associated experiences) has occasioned recent critical reappraisal of how both concepts operate in practice (Harvey and Waterton 2015: 905).

Within this landscape-heritage nexus, Dumbarton Rock and the Great Polish Map of Scotland can be considered as two contrasting but related examples of heritage landscaping, whereby the practice of heritage at both sites is deeply conjoined with various notions and rehearsals of landscape - from representation to lived reality. The term "heritage landscaping", describes the practice (intentionally or consequentially) of refiguring a particular landscape (or place) as one that is historically and thus culturally valuable. Deployed as a verb, it evokes the ongoing, situated practices which compose a significant aspect of landscape experience as well as the 'doing' of heritage. In this sense, heritage landscaping can be related to Garden's useful, but rather static, "heritagescape", that resists "the erroneous and superficial notion of heritagescapes as static or frozen spaces" towards a more dynamic understanding "of the unique experiential qualities and space of heritage sites" (2009: 288). The definition of my chosen research sites as two examples of heritage landscaping thus recognises the entangled and inter-related nature in which both concepts emerge in practice, as described by Harvey: "Heritage and landscape do not move as parallel lines, but are constantly folded into each other: no linearity and no stability. There is depth of time, but no convenient or uncluttered isolation of the self in the here and now" (2015: 920).

For Harvey the increasing recognition of landscape and heritage as cultural processes, as much as tangible 'things' has resulted in constructive synergies between the two concepts across academia, policy and practice:

The recent histories of heritage and landscape studies appear to be closely linked, with their epistemological, ideological and methodological twists and turns progressing amid a common broad intellectual and interdisciplinary space. This has not been a codependent evolution, but rather, a mutually supporting and often parallel endeavour of academic, policy and popular inquiry that explores the significance of landscape and heritage as meaningful categories of an emergent and processual nature (2015: 911)

It is in this fertile ground between the landscape and heritage concepts that I plant my own research on two examples of contemporary heritage landscaping, in which both are primarily understood as inter-related processes (as well as bounded objects). Due to the particularities of my two place-based studies of heritage landscaping, certain literatures specific to the treatment of each site (some regionally oriented, some historically specific, some conceptually-led) will be addressed in later thesis chapters. Consequently, the chief concern of this literature review is a critical elaboration of the primary concepts of landscape and heritage that unite them. As the two main primary concepts framing my inquiries, this review will consider literatures that reflect on, and contribute to, the recent genealogy of landscape and heritage. In each instance, I track and explain conceptual shifts towards more processual forms of understanding. That is to say, encounters with landscape and heritage which are active, primarily as doings (and grammatically speaking, as verbs, not nouns) as well as material objects and representations. While the literature review is principally refracted through the lens of cultural geography, the highly inter-disciplinary nature of both landscape and heritage studies means that, wider literatures, from cognate subject areas in the arts and humanities, are also given consideration.

To locate my own research within the two main conceptual categories of 'landscape' and 'heritage', I will initially describe landscape as a conceptual tradition in cultural geography and the importance of the performative turn and landscape phenomenology in introducing new approaches to landscape study and exposition. I will then consider how processual academic approaches have filtered through to policy but fall short in practice, highlighting the benefit of situated, localised studies such as my own. As with landscape, I shall briefly describe heritage as a conceptual tradition and the import of the performative turn upon praxis. As an outcome of this democratisation of the heritage process, I shall describe the

prevalence of public-participation and 'community' heritage, which is relevant to the situated heritage communities of my two place-based studies of heritage landscaping. Lastly, I shall consider the increasing recognition of intangible forms of heritage and the social values that heritage places generate outwith their official discourse and the increasing prevalence of digital technologies as a democratising tool in the heritage process.

The landscape of cultural geography

Due to its protean nature "landscape is the domain of no single discipline, but is rightly shared by many" (Fairclough 2012: 90). Indeed, such is the conceptual valency of landscape, that it commands thinking in a cohort of cognate disciplines, such as "landscape archaeology, landscape architecture, landscape ecology, and landscape planning", not to mention a significant body of grey literature concerned with its classification, preservation, management and development such as the influential European Landscape Convention (Thompson *et al* 2013: 1). A practical outcome of such a wide-ranging disciplinary presence is that questions of landscape are best approached through a conversational stance that encompasses multiple disciplines. While acknowledging landscape's trans-disciplinary status, it is landscape as figured in cultural geography which will provide the primary coordinates for conceptual understanding throughout this literature review, with landscape phenomenology providing a particular point of reference and a set of further methodological tools. As Daniels points out, geography "has always been multi-disciplinary" (2012: 276) and as such, it is well placed to act as a staging post and mediator for approaching the cross-disciplinary concept of landscape.

Within geography itself, Daniels states that "landscape is deployed in an extended and enriched way, co-ordinating geographies at different scales, mediating representation as well as reality, and intersecting with other key terms such as place, space, nature and environment" (2012: 277). Before considering more recent trends in cultural geography towards practice, performance, and process, it is instructive to briefly reflect on the manner in which landscape has been framed in western thought.

The etymological origins of landscape are commonly cited to lie with the Germanic word 'landschaft', as describing a bounded piece of land in a territorial and functional sense; with scenic and picturesque meanings being adopted later with the emergence of Dutch landscape

painting in the seventeenth century (Antrop 2013: 12). Although there is a large degree of ambiguity around the exact meaning of these etymological origins (Olwig 1996), it is fair to say that the notion of landscape as something visual and picturesque, is deep rooted in western thought.

Such an ocular-centric conceptualisation of landscape in the western mind is due to the influence of Cartesian philosophy and the ontological distinction made between mind and body, subject and object. As Thomas considers, "it is the combination of the conception of the world as image and object, and that of human beings as external observers that provides the conditions for the creation of the modern western notion of landscape" (2001: 167). Indeed, the technologies of landscape representation that emerged in the early modern period such as landscape painting, cartography, and topographic writing were covalent to the ontological separation of the human subject from the landscape object (Dalglish 2012: 329). As Bender notes, such developments were also politically laden, encapsulating "ideas about perspective, about distance between observer and observed, which make the observer active, the observed passive" (2002: 105). In this manner, the 'detached scientific gaze' implicit in such landscape representations was integral to the development of geography as a primarily cartographic discipline, closely wedded to militaristic and imperial ambition. Within such a paradigm, landscape was something to be mapped, objectified and mastered for human utility (Harley 1996).

Despite such empirical origins, landscape was used in an entirely different manner in the early development of cultural geography from the 1920s onwards. Carl Sauer deployed landscape in the Germanic sense (landschaft) as a "bounded area" of land and a basic unit of geographic analysis (Wylie 2007: 20), wherein landscape acted "as a unique synthesis between the natural and cultural characteristics of a region" (Antrop 2013: 14). For Sauer, landscape was primarily a human crafted cultural entity, and geography was the science of cultural landscapes (Wylie 2007: 21). Although Sauer's version of cultural geography has been subject to substantive and varied critique, it was instrumental in placing landscape at the centre of geography.

Despite the initial rise of cultural geography however, landscape was somewhat sidelined as "geography underwent a positivist restructuring as a consciously modern and forward looking, spatial and behavioural science" from the 1950s onwards (Daniels 2012: 277). In

this positivist paradigm, scholars such as Hartshorne saw landscape as a territorial concept to be confusing and redundant, and it was duly supplanted by more abstract notions such as region and space (Antrop 2013: 14). This turn to the scientific was indicative of the empirical and positivist traditions behind geography's academic inception.

Cultural geography thus lay fairly dormant until a revival in the 1980s, sparked by the emergence of humanistic geographers in the 1970s such as Yi Fu Tuan (1976), Anne Buttimer (1976), Edward Relph (1976), David Seamon (1979) and Douglas Pocock (1981), who were deeply dissatisfied with the dehumanising aspects of the incumbent spatial science. Phenomenology provided a key component of the humanist approach to geographical study due to its emphasis on the role of subjective human experience in formulating notions of place. As Buttimer noted, "phenomenology challenges each individual to examine his [sic] own experience, to become subject rather than object of research inquiry, and then reach for common denominators in the experiences of others" (1976: 288). Within this cultural turn, landscape was once again recruited as a core concept, in which its manifold nature as both representation and reality led to a swathe of diverging scholarly inquiry (Daniels 2012: 277). As Muir notes: "the subjective qualities which made landscape unacceptable to geographers in an era of spatial science and quantification would later commend it to geographers who were disorientated and disillusioned by the excesses and failures of the positivist movement" (1999: xvii).

Cultural geographers such as Cosgrove and Daniels (1988) focused on the semiotics of landscape through iconography - deconstructing naturalised representations of landscape (such as renaissance art and designed landscapes) to expose their social and political undercurrents. Cosgrove and Daniels' explicitly political reading of symbolic landscapes via structural materialism was in some ways a reaction to the "naivety" of humanistic geography in the 1970s in its overt focus on the self and resulting disregard of wider structural factors (Wylie 2013: 58). By scrambling the traditional idea of landscape as a stable 'palimpsest' of accumulated histories, to something altogether more kaleidoscopic and unstable, Cosgrove and Daniels denied "the possibility of discovering single 'authentic' meanings in landscapes" (Turner 2013: 135), with their edited volume *Iconography of Landscape* (1988), now considered a key text in the shaping of the cultural turn in geographical research (Della Dorra 2011: 265).

Despite their interest and attention to the labour of landscape (in terms of who was depicted or omitted in the production of a particular aesthetic), for its later critics, the symbolic interpretation of landscape espoused by Cosgrove and Daniels perpetuated the idea that landscape was primarily a "way of seeing" (Wylie 2013: 60), rooted in obdurate Cartesian dualisms of subject-object, mind-body and culture-nature - that essentially diminished the agency of the landscape to that of a passive object shaped by human culture. To counter this, geographers (re)turned to the phenomenological tradition in philosophy, and in particular the landscape phenomenology of anthropologist, Tim Ingold (2000), as a means of foregrounding the "myriad everyday embodied practices of interaction with and through landscape" by which people navigate the world (Wylie 2013: 59). In doing so, landscape was re-defined as something dynamic, sensuous and lived-in, as opposed to a passive material backdrop over which human culture is inscribed. This is not to suggest an overly simplified linear chronology of conceptual progression, by which the landscape iconography of Cosgrove and Daniels was superceded and duly discarded. On the contrary, although inflected and contextualised by more processual understandings, their critical analyses of landscape as a cultural construct retains its relevance, providing an "inescapable context for any discussion of phenomenology and landscape theory today" (Wylie 2013: 58).

Landscape and performance

With regards to how landscape is approached within this thesis, the import of Ingold's landscape phenomenology via the concomitant 'performative turn', provides a key reference point. With this in mind, I will briefly outline the contours of this significant conceptual shift within landscape research before providing specific examples of geographical work conducted with a 'performative ethos' that is relevant to my own situated landscape inquiry.

At the start of the millennium, Nigel Thrift stated that performance "is, at the moment one of the most pervasive metaphors across the human sciences" (2000: 225). In spite of the passage of years since Thrift offered this view, his words still ring true. Thrift himself played a key role in bringing performative thinking to the practice of cultural geography, through exposition and elaboration of what he termed a nonrepresentationalist style (2000: 213). At the heart of what has come to be known as non-representational theory, are ideas kindled from critical academic thought about the performing arts, such as theatre and dance, where conceptual emphasis is placed on notions of "creativity and play, the intermingling of the

normative and transgressive, the limits of representation, the expressive qualities of the body beyond discourse, and the full range of the senses including the kinaesthetic" (Pratt 2009: 526). From the outset, it is useful to note that although stemming from its use in a performing arts context, performance is an "inclusive term" (Rogers 2012: 61) that describes the everyday and often mundane actions with which we navigate the world. As Crouch states: "performance understands the manner, the complex character of the ways in which we engage in doing, acting, getting a grasp on who and where we are" (2013: 120).

It is also important to note that despite a title which suggests otherwise, 'non-representational theory' does not describe "a strict or prescriptive theoretical framework" (Waterton 2013: 68), but is instead used "as an umbrella term for diverse work that seeks better to cope with our self-evidently more-than-human, more-than-textual, multisensual worlds" (Lorimer 2005: 83). In light of this, Lorimer (2005: 84) suggests "more-than-representational" theory as a more apt term, countering concerns that non-representational theory, must be at the least exclusionary, or indeed, even anti-representational. With reference to such concerns, Dewsbury *et al* (2002: 438) state that:

Nonrepresentational theory takes representation seriously; representation not as a code to be broken or as an illusion to be dispelled rather representations are apprehended as performative in themselves; as doings. The point here is to redirect attention from the posited meaning towards the material compositions and conduct of representation.

A major spur for the non-representational project was a desire to go beyond the explicitly textual and representational focus of the established research approach in 'new' cultural geography; "to provide a body of work which values creative praxis" (Thrift 2000: 213, Thrift and Dewsbury 2000, Dewsbury 2000, Dewsbury *et al* 2002). The inclusion of creative praxis was seen as an antidote to the "deadening effect" (Lorimer 2005: 83) of incumbent cultural analyses (based largely on social constructivism) which privileged "the composition and communication of cultural meaning via text, sign, image and symbol "(Wylie 2007: 162), at the expense of "lived experience and materiality" (Thrift 1996: 4).

Landscape is one conceptual field and a long-standing subject of interest within cultural geography which has proven particularly fertile for propagating non-representational theories. This is partly an outcome of synergies between the performative basis of non-representational theory, and concomitant approaches to landscape that problematised

straightforwardly representational framings, extending studies to consider the embodied and material aspects of landscape via the phenomenological tradition in philosophy. Waterton (2013: 73) notes the 'good fit' between the two, stating that a non-representational approach "firmed up and fleshed out a series of longer standing assumptions that had already rendered landscapes affective, embodied, sensuous and material", while acting as the primary intermediary for the crossing over of performative thinking into landscape studies (Wylie 2007: 166).

To appreciate the traction of the performative turn within landscape research, it is useful to consider Wylie's concise description of the non-representational perspective, that "the world is understood to be continually in the making – processual and performative – rather than stabilised or structured via messages in texts and images" (2007: 164). Notably, the uptake of Ingold's phenomenological approach to landscape within cultural geography was primarily due to the advent of non-representational theory, or the 'performative turn' (2007: 162) - with Ingold's dwelling perspective providing a key intellectual resource for Thrift in a sequence of formative papers on non-representational theory (Wylie 2007: 163). The dwelling perspective proposed by Ingold, sought to dispel the overly visual and symbolic focus of constructivist epistemologies by foregrounding "the simultaneous and ongoing shaping of self, body and landscape via practice and performance" (Wylie: 2007: 166). Ingold outlines his perspective in the following terms:

A place owes its character to the experiences it affords to those who spend time there - to the sights, sounds and indeed smells that constitute its specific ambience. And these, in turn, depend on the kinds of activities in which its inhabitants engage. It is from this relational context of people's engagement with the world, on the business of dwelling, that each place draws its unique significance (Ingold 2000: 192).

From the dwelling perspective then, landscape is understood as embodied, tactile, sensuous, temporal and performative. As Waterton writes, "landscapes in this rendering are not static backdrops, but instead are imagined as fluid and animating processes in a constant state of becoming. More importantly still, our precognitive and embodied interactions with them draw us into equally fluid practices and performances" (2013: 70). This sense of fluidity and motion is reflected in the conceptual shift from thinking of landscape as an object or noun, to a verb – a kinetic act of landscaping whereby commonplace activities, such as "walking, looking, driving, cycling, climbing and gardening" (Wylie 2007: 166) are interpreted as "embodied acts of landscaping" (Lorimer 2005: 85). Attention to these practices of

landscape, has occasioned a "broad methodological shift towards a more ethnographic and performative ethos" (Wylie 2007: 166) which is better attuned to the situated and site-specific nature of landscape experience. It is within this broad methodological shift that I situate my own participatory research, with landscape phenomenology providing the conceptual grounds for approaching my two study sites as embodied processes of heritage landscaping in which the "business of dwelling" is primary (Ingold 2000: 192).

The advent of non-representational theory has thus been a key factor in importing a broader performative approach to landscape research, with the landscape phenomenology of Tim Ingold proving particularly influential in re-rendering "landscape from a distant object or spectacle to be visually surveyed to an up-close, intimate and proximate material milieu of engagement and practice" (Wylie 2007: 167). As Waterton (2013: 69) observes: "affect and non-representational theories have started to animate new and creative approaches, triggering research responses that attempt to access, understand and communicate the ways in which people perform and embody the landscapes around them". Let us now turn to some specific examples of such research responses.

Performing geographies

The meeting of performance and landscape has led to a diverse output of scholarly work in a variety of guises. As an initial aside, it is worth reiterating the conceptual appeal of performance to geographical study, and the fresh perspectives it has opened up:

Geographers have viewed performance as a means through which to examine how spaces are practiced and experienced through our bodies. The performing arts are playful, creative and experimental, they draw attention to the poetics of being in the world, to the experience of emotion and affect, and to the constitution of subjectivity (Rogers 2012: 60).

In this sense, a performance-based approach is a useful means of attending to the inherent subjectivities at play in the cultural processes of landscape and heritage; subjectivities which are increasingly recognised as important not only in academia but in policy circles too (Swanwick 2002). Work conducted in the earlier years of the 'performative turn' is attentive to the embodied practices through which landscape is realised, though a wholesale uptake of a non-representational vocabulary is not yet apparent. For instance, although Edensor (2000) considers the embodied practice and performance of walking in the British countryside, performance is recruited as metaphor for the enactment of habituated cultural norms of

"appropriate bodily conduct, experience and expression" bound up in recreational walking in Britain, as opposed to the affective, experiential qualities of landscape (2000: 83). Similarly, Lewis (2000) focuses on the practice of adventure rock climbing in which landscape and body become conjoined through tactile and kinaesthetic immersion, though the overall conceptual frame is one of "bodily resistance against the desensitizing and pacifying proclivity of modernity" (2000: 58). Despite Lewis' overt focus on the 'body politic' of rock climbing, his account of the phenomenological, tactile landscape within which the rock climber operates provides a key reference for my own situated study of Dumbarton Rock's climbing culture and associated heritage landscape. In a similar vein, Lorimer and Lund utilise "direct embodied experience" (2003: 132) in a study of Scottish mountain walking, wherein performative theories are noted, though not wholly subscribed to. While wholly conscious of (then emerging) performative theories that seek "to explain elements of bodily movement and the experience of mobility" (2003: 142), for the authors, hill walking is carried out within the wider abstraction and social circulation of mountain classification, or facts, that act as "friction points in the flow of fleeting improvisations that constitute our performances in, and of, these settings." (2003: 142). In a more recent paper on the (re)production of climbing space, Rickly (2016) echoes Lorimer and Lund's earlier acknowledgement of the entwined nature of the landscape-as-text (representations and abstractions), and the landscape-as-body (embodied experience and practice), by illustrating the manner in which both are co-produced and mutually reinforcing. It is this holistic approach to landscape, which focuses upon the complementarity (as opposed to supposed dichotomy) of the 'traditional' approach to landscape-as-text (or symbol) and the latter turn towards the landscape-as-body, which guides my own approach to two contemporary examples of heritage landscaping in Scotland.

Though by no means a uniform process, the gradual uptake of a non-representational approach to landscape, has occasioned a "focus upon participative or practice-based methods that move us forwards with regard to accessing the 'now' of experience as it edges into view" (Waterton 2013: 73). In pursuing this endeavour, certain work has displayed a willingness to engage with narrative in a more creative manner than more traditional academic writing on landscape and embodiment to capture the poetics of being in the world. Wylie proposes that "phenomenology offers possibilities for more evocative and creative forms of academic writing" (2013: 61), and by this token a phenomenological stance is *de facto* for performative work on landscape. Such work is indicative of "attempts to entangle landscapes with bodies,"

to meld landscapes and selves, via the lenses of non-representational theories" (Waterton 2013: 72). For instance, Wylie utilises a highly personal, descriptive writing style to relate the experience of a single day's walking along a stretch of the South West Coastal Path in Devon. This mode of expression is employed to creatively and critically consider the varied interplay between self and landscape that emerges through "the affective and performative milieu of coastal walking" (2005: 234). In a later paper (2006), Wylie adopts a creative photographic methodology in an attempt to convey his experiences of self and landscape while exploring the sea-dissected Smoothlands valley – a particularly striking topographical feature encountered during his outing along the Devon coastline. The use of multiple photographs in differing arrangements, interspersed with text can be interpreted as an attempt to convey the tension inherent in landscape – between "subject and object, self and world" (2006: 465). In a similar vein, Lorimer and Wylie (2010), creatively engage with landscape through a performative writing style that evokes the multi-sensuous (in particular sonic) aspects of the Welsh landscape, as they journey across it to a shared destination by separate routes. This commitment to creativity in narrative style and the use of photography is one that informs this thesis, whereby sections of expressive, narrative prose sit alongside more conventional analytical forms in a bid to convey the immediate, emotional and experiential aspects of my place-based studies of heritage landscaping, as well as their textual and representational forms.

A special issue of *Performance Research* (2010) entitled *Fieldworks* illustrates the productive synergies that have occurred between geography and the performing arts via the go-between of landscape, and the manner in which a performative ethos underlies much landscape work within cultural geography. A key impetus for this coming together of performance studies and geography was the AHRC's Landscape and Environment programme, which from 2005 funded a broad array of multi-disciplinary research on the manner by which landscape, as both material reality and imaginative representation, acts as "the loci and medium for the negotiation and expression of complex ideas, feelings and experiences" (Daniels *et al* 2010: 1). In aiming to access this meshwork of landscape experience, one of the key research tools to emerge was that of performance – "not only as a creative practice and mode of representation but also as a vital means of embodied engagement and enquiry" (Daniels *et al* 2010: 1). This culminated in the Living Landscapes Conference (the final destination of Lorimer and Wylie's aforementioned journey across the Welsh countryside), which in posing questions around landscape and performance revealed

a shared ethos "between scholars and artists working in performance studies and those working in human and cultural geography" (Daniels *et al* 2010: 2).

Within this interdisciplinary dialogue between human geography and performance, arguably it is "the exchange of ideas around landscape chorography and phenomenology [that] have been the most fertile" (Rogers 2012: 62). A primary example of this lively exchange is the work of performance studies academic Mike Pearson. Central to Pearson's work is the traditional (and to some outmoded) geographic idea of the region or pays, to which he applies an embodied, performative chorography. Pearson's chorography, that is; "the detailed topographical description of landscape – its features, terrains, geomorphology, historical sites, inhabitants and folk traditions" (2006: 6), is conducted in the regional landscape of North Lincolnshire and recalled in his book << In Comes I>>: Performance, Memory and Landscape (2006). Utilising scripted material from a selection of his solo performance works such as Bubbling Tom (2006: 21), Pearson fuses a peripatetic ethos and geographical sensibility (village, neighbourhood and region) with autobiographical memory and everyday speech, to evoke "a form of theory-informed story-telling" (2006: 16). Thus, "performance becomes a topographic phenomenon of both natural history and local history" and the region of North Lincolnshire emerges at a variety of scales and registers - "horizontally across the terrain and simultaneously vertically through time" (2006: 16), wherein its open landscape and underlying geology of limestone, chalk and clay are bound to peopled histories of agricultural labour and distinctive folk traditions such as the competitive, masculinised scrummage of the 'Haxey Hood' (2006: 153).

Although primarily 'of performance studies', Pearson notes some key influences upon his thinking from cultural geography. It is apparent that he values Thrift's non-representational emphasis on "creative practice, invention and imagination" (2006: 16), and << In Comes I>> duly "takes up the challenge to develop a non-representational style, in which there is no last word" (2006: 16). In his pursuit of this, Pearson also utilises Ingold's performative concepts of the taskscape and wayfinding, which emphasise "embodied acts of storytelling, dramatic event and scene setting" (Rogers 2012: 62). The taskscape as a perpetual "matrix of movement...bound together by the itineraries of inhabitants" and wayfinding as a process of navigating between places that "more closely resembles story-telling than map-using, as one situates one's position within the context of journeys previously made" (Pearson 2010: 15). Pearson also references the seminal humanistic geography of Yi Fu Tuan, in

"acknowledging the affective ties between people and place" (2006: 4) and acknowledges the landscape work of Hayden Lorimer and John Wylie in their use of "creative practice, mode of representation, embodied inquiry and analytical trope and affect" (Pearson 2010: 14). Pearson's companionable approach with regards to landscape study is also foreseen in earlier work (Pearson and Shanks 2001), which highlights the potential for productive synergies between performance and archaeological practice, in the storytelling or "deep mapping" (2001: 64) of a landscape. At the outset, an interdisciplinary stance is taken up, which reflects the eclectic style of his subsequent North Lincolnshire chorography: "the folklorist, the geographer are most welcome to come and stand in our field. We do not simply want to appropriate their methodologies. We want them to look, and enable us to look through them, at performance: it is already in the nature of their discourses to favour the local, the particular" (2001: xiv). In its inherent propensity towards a multi-disciplinary stance then, performance is well placed as a means of attending to the poly-vocal nature of landscape, "in which there is no last word" (Pearson 2006: 16).

It is apparent that the flat expanses (with hidden depths) of the North Lincolnshire landscape provide an energising muse for Pearson, and his "performance-based approach to chorography has reinvigorated this form of geographical inquiry" (Rogers 2012: 62). Indeed, regional landscapes appear to provide a nodal point for the exchange of ideas between performance studies and geography (Matless & Pearson 2012), with Pearson's performative chorography resonating particularly with the work of geographer David Matless - whose own patch for regional enquiry is the Norfolk Broads (Matless 2010). These synergies are in part due to the performative nature of regional fieldwork itself, where deep mapping and thick description involve various modes of walking, wayfinding, observing, listening, conversing, note-taking, photographing and archival work. As Matless notes "performative engagement with region may allow the geographer to revisit and recast longstanding forms of geographical practice – fieldwork, local study, survey" (2012: 124).

With this in mind, Matless offers a performative account of the Norfolk Broads, by visiting "six pressure points within the regional cultural landscape...where tensions of landscape become acute" (2010: 73). Writing in creative prose, with a 1950s tourist map acting as a representational cultural backdrop, Matless offers an account of each "pressure point". Each account is polyvocal in tone, moving "with a composite eye" (2010: 77) with short cursory sentences conveying the varied, observational flashes that landscape evokes: "To a rare airy

prospect. Onto something unexpected (boats!), or something just seen (boats). Fields, fruit trees in line, and in the far east water towers, and turbines; some in the sea" (2012: 73). Similar to the work of Pearson, shifting registers are employed – gazing over the landscape from a vantage point, to a grounded corporeal presence, sensory information, passing memories, historical event, industrial infrastructure; all are engaged in "a democratic attention to all kinds of regional object" (2012: 77).

As Matless notes, "performance and geography carry different histories to meet at chorography", with performance arriving at the region with a fresh perspective, unburdened by the disciplinary baggage of geography in which regional description was stigmatised as unbefitting of a scientific discipline (2010: 76). Matless considers the chorographic mimicry of Pearson and the thick description of authors such as Tim Robinson (2008) as indicative of "the performative possibility and cultural currency of landscape description" (2010: 78). Description can of course, occur in different registers "at once generative and calculating, a procedure giving an account of landscape in the sense of both dramatic narrative and patient itemization" (Matless 2010: 78). This reappraisal of landscape description as a performative trope, has occasioned a shift towards more creative ways of narrating landscape, that playfully push at the limits of academic conventions for published writing, such as the aforementioned work of Lorimer and Wylie (2010). Though my own research is not explicitly performative in the manner of Pearson's chorographical dramaturgy nor conducted at the regional scale of Matless, their eclectic, democratic approach to the study and exposition of the particularities of their respective local landscapes is one that informs my own situated, site-specific studies of heritage landscaping, in which the nuances of each are attended to via the use of varied modes of geographical inquiry and descriptive registers in a chorographic spirit.

Interestingly, and of relevance to the historiographical aspects of my own research, a creative approach to narrative has also been used as a means of negotiating the "inherent difficulties in tracing ways of moving, feeling or performing in the past" (Lorimer 2003a: 202). As Lorimer notes, a non-representational approach to past practices of landscape poses specific challenges in finding "sources which capture (or at least take us closer to) the smells, sounds, sights and feelings of direct, embodied experience" (2003a: 202). However, rather than provoking a rejection of representations of past landscapes as too sterile for these purposes, for Lorimer, "the key requirement is a creative engagement with, and imaginative

interpretation of, conventional 'representational' sources" (Lorimer 2003a: 203). Such a reflective stance holds true in relation to my two chosen study sites where much of their respective representational archives stem from an embodied engagement with landscape. The representational archive of Dumbarton Rock in particular, is one primarily contained in the writing and photography of published and unpublished guidebooks, which draw directly from the aggregated, ongoing practice of rock climbing. In this sense, the Rock's archive cannot be separated from the act itself. As Merriman et al state (2008: 193) "reading and writing, not to mention photographing and archiving, are important practices embroiled in the performativities of many landscapes". Lorimer's assertion that a non-representational approach can enliven the past as well as elucidate the immediacy of the present thus goes some way to dispelling the notion that the focus of non-representational theory on the "present moment of practice" leads to a form of "presentism", and a "relative neglect of the trajectories of past-into-present which are always in place through various interconnecting ecological, corporeal, material, cultural, economic and memorial flows" (Jones 2011: 876). In conducting a study of two landscapes in which the notion of heritage and the presence of the past is primary then, it is important to acknowledge the role of individual and collective memory upon the conduct of ongoing performances of landscape. As Ingold notes, to interact with landscape "is to carry out an act of remembrance", which arises through the phenomenological process of "engaging perceptually with an environment that is itself pregnant with the past" (Ingold 1993 in Hill 2013: 380)

One approach to accessing the embodied practices of past lives and landscapes that has emerged from a non-representational stance to the archive is that of "multi-sensual biographies" (Lorimer 2003a: 203). For instance, Lorimer (2003a) utilises personal accounts of participants and leaders in a 1951 fieldwork course centred around Glenmore Lodge and the Cairngorm mountains, to uncover the spaces of geographical learning that took place through bodily immersion in landscape and "active field performance" (2003a: 215). In a related paper, Lorimer (2003b) uses the same Glenmore Lodge field course of 1951 and the occasion of its continued (though differing) performance in 2002, to creatively narrate the embodied taskscapes of fieldwork through its varied and ongoing archive; whether material objects, mnemonic devices or physical phenomena (2003b: 278). What emerges is a sense that the peripatetic taskscapes of this geographical learning, cannot be fixed to specific "spatio-temporal coordinates", or be subsequently 'captured' and committed to the archive,

but "keeps happening: an unfinished project that speaks of the localized, everyday conditions in which geography's history is made" (2003b: 302).

Lorimer's varied research on lives lived in and amongst the landscape of the Cairngorm mountains (which Matless 2010: 75 cites as indicative of a revived geographical interest in the regional), is notable in a flexible approach to methodology that is attuned to the varied entanglements of life, landscape and memory in particular places. For instance, in his biographical, reconstructive ethnography of a Swedish diasporic reindeer herd in the Cairngorms, Lorimer covers various registers of memory and scale; from intimate day-to-day engagements between herders, herd and landscape to transnational movements of people, animals and customs, through archive, encounter and ecological mapping (2006: 479). What emerges is a sense of the varied sources of dwelling, both human and more-than-human that compose the biogeography of the herd, and "the vital, animate, and lively energies that announce themselves as landscape" (2006: 516). This foregrounding of narrative and storytelling as a means of getting close to the intimate entanglements of landscape, life and memory is also embraced in more recent work.

Here, Lorimer (2014) reflects on the benefits and pitfalls of such an approach, where the close study of a family's life lived amongst its surrounding landscape draws up both the intimate emotional geographies of topography, as well as the sometimes painful act of remembering upon the remaining family member. MacDonald (2013) also adopts a form of "creative non-fiction" (2013:3) to tell the life story of archaeologist Erskine Beveridge through the narrative device of his ruinous family home of Taigh Mòr on North Uist, declaring a "primary commitment to storytelling as an exemplar of geographical writing" (2013:2), and a means of "apprehending the mysteries of character and landscape" (2013: 3). Although not resolutely performative, examples such as these that experiment with the creative potential of story-telling and biography are indicative of approaches to landscape, that seek out the more-than-representational pulse and rhythms of life that shape their archival traces, to critically and creatively express the tangled "relationships between biography, history, culture and landscape" (Wylie 2007: 206). Such an approach chimes with my own research, wherein biography and landscape are interwoven and entangled in placebased narratives. To elaborate, the climbing heritage of Dumbarton Rock is based largely upon pioneering ascents by trailblazing individuals, who effectively write themselves upon the landscape via the naming, grading and recording of routes in guidebooks which are subsequently reperformed by fellow climbers. The landscape (albeit a miniature one) of the Great Polish Map of Scotland is also one in which the biographies of a few key individuals are enfolded. In this sense, the landscapes of each of my case studies cannot be apprehended without recourse to the biographical stories woven around them and the spectral presence of those who populate them, particularly as these rememberings constitute a significant component of the associated heritage of each site.

Summary

The coming together of landscape and performance has produced a diverse array of research outputs; from the more explicitly performative work of Mike Pearson, to the creative and experimental ways of narrating landscape explored by Wylie and Lorimer. Far from the awkward small talk of strangers, landscape and performance have struck up an easy conversational friendship, exemplified by the leading role played by performance in the AHRC's Landscape and Environment program. Such an outcome is also reflective of the fact that the protean, trans-disciplinary nature of landscape has often engendered intellectual exchange between cognate disciplines such as cultural geography, archaeology, history, architecture and ecology (Thompson et al 2013: 1). Nigel Thrift's call for a nonrepresentational style, was particularly influential in bringing performative thinking to cultural geography as well as the landscape phenomenology of Tim Ingold. Both were critical in occasioning a conceptual trend towards the processual and practiced aspects of landscape experience and a concomitant "broad methodological shift towards a more ethnographic and performative ethos" (Wylie 2007: 166). While much focus duly fell on "embodied practices of landscaping" (Lorimer 2005: 85) such as walking and climbing, its representational forms were not duly discarded as surplus to requirements, but instead remained as "integral to a variety of more-or-less lively performative encounters and movements" (Merriman et al 2008: 193). Although critiqued by some as apolitical, and naïve to the wider structural mechanisms of geopolitics and power (Cresswell 2012), it is clear that non-representational theory and the performative turn has had a significant impact upon on landscape research, as well as the conceptual landscape of the humanities more broadly. Within my own research the adoption of a performative of ethos is useful, as it is well attuned to the dynamic, ongoing nature of landscape experience which exists at the Rock and the Map and also provides a good conceptual grounding from which to reach out to the more traditional representational facets of each place in a lively manner.

Landscape in policy and practice

It is important to note that the conceptual transition of landscape within academia from an object-oriented approach to a process-oriented approach (as described above through the modern historiography of cultural geography), is one that has also filtered through into a policy context. In conducting research on two 'grounded' studies in which the notion of landscape is key, it is thus important to briefly consider the policy environment in which definitions and decisions regarding landscape are made, and the manner in which certain "national values" are promoted (Wylie 2014: 268). As Harvey and Waterton note "heritage and landscape (management, protection and enhancement) are increasingly seen to reside within an orbit of governmental duty, as well as a means through which governance ambition can be instrumentalized" (2015: 905).

Despite its broad meaning and ambiguous nature, the term 'landscape' provides an important focus in managing human - environmental relations and is duly recognised in policy "as an integrative and inclusive concept expressing the relationship between people and place" (Sarlöv Herlin 2016: 176). This is evidenced in a European context by the overarching framework of the European Landscape Convention (ELC), formulated in 2000 by the Council of Europe (CoE), as means of directing landscape policy in its member states. The ELC was signed and ratified by the UK government in 2006 (Sarlöv Herlin 2016: 176). The ELC defines landscape as "an area, as perceived by people, whose character is the result of the action and interaction of natural and/or human factors" (CoE 2000). The ELC's definition of landscape thus recognises its broad meaning, and significantly, the primary role of human perception in shaping people's experiences of the landscape. Subsequently, understanding people's perceptions of landscape and the subjectivities that shape them (such as embodied experience) become a matter for policy, not just philosophy. As Butler & Berglund consider, the ELC's focus on the perceptual aspects of landscape "promotes landscape as the domain of society, providing a space for democratising landscape as recognised as a common resource. If landscape is to be understood in such light then there is a need to access what values society places on the landscape" (2014: 220).

The 'democratic' approach to landscape advocated by the ELC is partly an outcome of landscape being anchored to the broader paradigm of sustainable development, which seeks to ameliorate environmentally damaging, short-term economic decision making by

forwarding "culture, society, economy and environment as mutually reinforcing concerns rather than necessarily conflicting objectives in a zero sum game" (Dalglish 2016: 213). As Dalglish notes, by conceptually aligning landscape with sustainable development, the ELC foregrounds certain key principles to guide landscape understanding and decision making. Namely, *integration* (landscapes are complex wholes comprised of many inter-relating factors), *universality* (all landscapes are important), *quality* ('good' landscapes as a prerequisite for individual and social well-being), and *cooperation* (inclusive forms of governance and cooperation are required to address the complex nature of landscape) (2016: 214). With regards to the state-level conduct of classificatory methods and associated landscape typologies, the ELC's remit of universality is pertinent, as it "escapes from the exclusiveness of special designation, insisting that all landscape everywhere is part of Europe's common heritage" (Fairclough 2012: 109).

This commitment to universality (that all landscapes are important) is particularly relevant in a Scottish context, with earlier efforts at landscape classification focused on identifying 'special' landscapes as distinct from the 'ordinary', with a traditional focus on the reified landscape of the Scottish Highlands as *the* defining Scottish landscape (Murray 1962). The statutory advisor for the Scottish Government on matters of landscape is Scottish Natural Heritage (SNH), and the Scottish approach to the implementation of the European Landscape Convention is conducted via SNH's *Landscape Policy Framework* and *Landscape and the Historic Environment – A Common Statement*, a collaborative document compiled by SNH, Historic Environment Scotland (HES) and the National Trust for Scotland (NTS). Broadly, the ELC requires member states to take an inventory of all landscapes within their national boundaries and calls for the analysis of distinctive landscape characteristics to better inform decision making. According to the ELC, this decision making should be conducted in a democratic manner, with member states required to define "landscape quality objectives" which capture "the aspirations of the public with regards to the landscape features of their surroundings" (Dalglish 2018: 23).

Rather than a narrow focus on 'special landscapes' then, the ELC seeks to go beyond special interests to define landscape matters as important to "everyone, everywhere" (Dalglish 2018: 24). This universal approach is reflected in *Scotland's Landscape Charter*, a set of principles signed by SNH, HES and a variety of NGOs, businesses and third-sector organisations which hold landscape interests, stating that "all landscapes are important and everyone has a right

to live in and enjoy the benefits of high quality surroundings" (Dalglish 2018: 24). Implicit in this statement is a principle of participation, by which the communities who live in and amongst certain landscapes should be consulted on their management, particularly as they will likely possess a differing set of values and perceptions from those held by 'expert outsiders' such as landscape professionals. This participatory paradigm is evident in SNH's *Landscape Policy Framework*, which advocates the closer involvement of a broad range of landscape stakeholders:

...to engage actively with communities of place and communities of interest, and enhance our understanding of their landscape values, so as to be able to set their perceptions and priorities alongside our own professional analyses and assessments...Decisions about our future landscapes are not a matter solely for specialists (in Dalglish 2018: 24).

Such a statement is relevant to my own sites of enquiry, where two communities of interest operate with a distinct set of localised landscape values. In this sense, one might argue that a New Scottish Landscape is emergent not only in undercurrents of personal, performative and philosophical preferences for the marginal - but in policy too. Indeed, the Scottish Landscape Forum's 2007 Report to Scottish Ministers outlines a "new landscape agenda for Scotland", with the 'de-centralised' landscape approach of the ELC providing a key reference (2007: 9).

In fulfilling their obligations to take stock of Scotland's landscape assets, the method employed by SNH is that of Landscape Character Assessment (LCA). LCA has its origins in the mid-1980s, when disillusionment with the ability of previous methods to deal with the complexities of landscape, and the emerging discourse of sustainable development, led to the development of 'landscape assessment', which sought to separate the classification and description of landscape character, to assess what makes one landscape, distinct from, as opposed to better than, another (Dalglish 2016: 214). Throughout the 1990s, increasing emphasis upon the role of 'landscape character' led to the formulation of landscape character assessment (LCA), which now provides the standard means of landscape assessment in England and Scotland (Swanwick 2002).

Character in this sense, is conceptually deployed with the intention of providing a "relatively value-free" (Swanwick 2002: 9) process of description and classification, prior to the subsequent imposition of any subjective values or judgements upon the landscape in

question. As Swanwick states in a 2002 edition of LCA guidelines: "Character makes each part of the landscape distinct, and gives each its particular sense of place. Whether we value certain landscapes for their distinctiveness, or for other reasons, is a separate question." (2002: 9). Integral to the LCA method then, is a division of the (more objective) process of characterisation, and the making of (subjective) judgements to inform management decisions (Swanwick 2002: 8).

Between 1994 and 1999 SNH duly commissioned a series of 30 LCA reports that, together, covered the whole of Scotland. The impetus for this nationwide survey was SNH's discovery soon after its founding in April 1992 "that there was no coherent or comprehensive body of knowledge or inventory in existence on the landscapes of Scotland" (SNH 2002: 8). The benefit of conducting such a national program of landscape inventory is realised with Sarlöv Herlin's statement that "a systematic approach such as the LCA method can strengthen the elusive concept of landscape, which has a weaker role in planning compared with many other interests" (2016: 183). In the proceeding years since these assessments were conducted, development pressures and patterns have shifted, and digital technology has become ubiquitous. Due to such changes, SNH updated and reviewed these earlier LCAs so as to create a single, interactive, digital dataset, which was made available to the public in 2019 via their website. Such an outcome is indicative of a broader shift towards 'integration' and accountability in landscape decision making, underpinned by the participatory ethos of the ELC (Butler & Berglund 2014).

SNH's national programme of LCAs divided Scotland into 3900 distinct character units, with each one assigned one of 275 Landscape Character Types. LCTs are "distinctive types of landscape that...share broadly similar combinations of geology, topography, drainage patterns, vegetation and historical land use and settlement pattern" (Swanwick 2002: 9). In effect, the process of LCA involves a desk-based review of available landscape information by landscape professionals as well as supplementary field-surveys to provide "the important ground level view that shows how the landscape is seen by people" and to help record the "aesthetic and perceptual qualities" of a given area (Swanwick 2002: 30).

At the heart of LCA guidelines is a recognition of landscape's multi-faceted and complex nature, with the assertion that "people's perceptions turn land into the concept of landscape. This is not just about visual perception, or how we see the land, but also how we hear, smell

and feel our surroundings, and the feelings, memories or associations that they evoke" (Swanwick 2002: 2). As Butler identifies, in practice "this definition moves away from the earlier understanding of landscape assessments as being a professional, aesthetic and objective representation. It recognises that in order to assess landscape there is a need to understand how it is perceived; dependent on feelings, associations, relationships and interactions" (2016: 242). LCA guidelines also state unequivocally that "landscape is everywhere" (Tudor 2014: 12), and as such, it occurs in a variety of settings and at different scales. As Swanwick asserts while defining landscape in the LCA guidelines: "The term does not mean just special or designated landscapes and it does not only apply to the countryside. Landscape can mean a small patch of urban wasteland as much as a mountain range, and an urban park as much as an expanse of lowland plain" (2002: 2). Implicit within landscape policy then is a recognition of the processual nature of landscape, and a recognition of the importance of individual subjectivities and human embodied experience in shaping people's perception of it. Might such an outcome provide an invitation for performative academic approaches to 'everyday' landscapes to gain some traction in a policy environment?

In practice, despite a commitment to the participatory approach advocated by the ELC and an acknowledgement of the importance of landscape's more intangible qualities, under examination, LCA is found to be lacking. For Butler, despite the participatory rhetoric of LCA, by which landscape is approached as a "holistic and democratic concern", and individuals are considered as "experts on their own landscape", research tends to focus on "supposed objective and scientific landscape values to which the general public have no immediate relation...missing the intimacy and subjectivity of the insiders who directly experience the landscape" (2016: 240). Butler sees this misalignment between the goals and outputs of LCA as an outcome of the prominence of the professional, "objective outsider" in the process, whose judgements are "predominantly based on aesthetics and focusing on the physicality of the landscape" (2016: 239).

The disconnect between LCA's advocacy of landscape as an inclusive concept and actual levels of public engagement in practice, is the subject of an earlier paper by Butler & Berglund (2014). In it, they assess 52 separate LCAs conducted between 2007-2011 and find that only one quarter of those studied involved the public at all, and those that did, displayed varying degrees of actual public engagement (2014: 219). This participatory deficit can be

explained in part by the fact that "public perception is both complex and problematic" (Butler & Berglund 2014: 234), as is the concept of landscape itself. It is one thing to acknowledge landscape as an individually perceived, hands-on and lived entity, though it is quite another to effectively incorporate such voices into an assessment process and policy environment in which objective data and 'facts', speak far louder than words. While acknowledging such difficulties, Butler & Berglund contend that to attain genuine public engagement via the LCA method "there is a need for realisation of the diversity of perceptions held by those influenced by the landscape...[and an] awareness of whose perceptions are being communicated and whose have been left out" (2014: 233). Only by pursuing these *other* values, can LCA "identify values in the landscape, rather than just dictate what these values are", and in doing so fulfil its potential to strengthen democratic processes around landscape decision making (Butler 2016: 250). As Butler concludes however, "practice has a long way to go in order to fulfil this potential, questioning what lies at the heart of landscape characterisation; landscape, and how it is handled" (2016: 250).

Similarly, Dalglish and Butler consider that in practice, LCA and associated methodologies "fall short because they frame character too narrowly and in an insufficiently integrated and qualitative way, and because they are insufficiently inclusive and cooperative" (2016: 224). Furthermore, in a recent examination of the Scottish context of landscape management Dalglish notes that despite commitments in policy to a democratised understanding of landscape, problems persist in implementation. Within this extensive review, Dalglish (2018: 21) identifies some key tensions in Scottish landscape policy that are of particular relevance to my own research on two examples of situated heritage landscaping in Scotland:

- 1 Despite the principle that an 'all landscapes' approach should be taken, in practice, landscape is still seen as a rural issue with the protection of 'special' landscapes the core aim.
- 2 Despite the recognition that variable, subjective human perceptions are key to the experience of landscape, in practice, variations are ironed out in a bid to make universally valid statements and limit the range of values considered.

3 – Despite the principle that public participation in landscape decision making is a right and should be promoted, in practice, an inherited culture considers landscape matters as something best handled by professionals, via technical processes.

It appears then, that the democratised approach to landscape advocated in contemporary policy is not one that it is met in practice, with the alternative voices and values of communities of place not adequately accounted for. As Dalglish identifies, an entrenched, expert-led model of landscape management in Scotland remains a barrier to the effective realisation of the principle of participation, as well as shortcomings in the LCA method itself. Though it is unreasonable to expect LCAs conducted at a scale of 1:50,000 to account for the minutiae of landscape experience, the potential for small-scale, situated and sustained modes of landscape encounter to embellish and enhance the broad brushstrokes of LCA and related landscape policy is clear. With regards to my own notion of heritage landscaping, the value of participatory, small-scale studies is lent further credence by the fact that in the heritage arena too, policy commitments to a democratised, community-led approach to heritage also tend to fall short in practice (Jones 2016).

Introducing heritage: a critical consideration

Having provided some conceptual context to my 'processual' approach to landscape within this thesis, I shall now do the same for the notion of heritage. Landscape and heritage share similar characteristics of conceptual flexibility; their form can be stretched to fit the tangible and intangible, cultural and natural, material and ideological or national and local. Indeed, the elastic meaning of the term 'heritage', akin to that of landscape, is seen in its broad definition as "a version of the past received through objects and display, representations and engagements, spectacular locations and events, memories and commemorations, and the preparation of places for cultural purposes and consumption" (Waterton and Watson 2015: 1). This somewhat fluid definition reflects a more nuanced, contemporary approach to heritage in which heritage is understood as something done, a 'doing' so to speak, as opposed to a materialist focus on the "original fabric" (and preservation) of historic objects, which has defined traditional heritage practice (Jones and Leech 2015: 7).

As noted previously, Harvey states that "the recent histories of heritage and landscape studies appear to be closely linked, with their epistemological, ideological and

methodological twists and turns progressing amid a common broad intellectual and interdisciplinary space" (2015: 911). This recent history has been one of a respective shift away from considering their subjects as fixed objects, towards a more dynamic, processual understanding in which landscapes and heritage are acknowledged as culturally constructed and contested (as well as being material entities). As Harvey states in an earlier paper "perhaps even more so than the representation of landscape, heritage is a present-centred cultural practice and an instrument of cultural power" (2001: 336).

The commonalities between landscape and heritage provide a useful means of tracking the conceptual trajectories of each. Though this section of the literature review is concerned with the notion of heritage then, references to landscape will be made throughout. Indeed, as my conception of heritage landscaping suggests, both heritage and landscape are deeply conjoined, so much so that it would be erroneous to consider one in isolation from the other. As in the previous section on landscape, I provide some conceptual background to contemporary understandings of heritage by briefly outlining the recent history of heritage studies towards more fluid, cultural understandings. As key outcomes of this processual turn and with relevance to my own research, I will then consider the increasing focus of heritage practice on more intangible forms of heritage, such as the social values that historic sites generate outwith their official designations. This shift in focus has occasioned a prominence of varying forms of 'community heritage' in which the principle of participation is key and non-expert priorities are more fully attended to in decision making processes (Jones 2016). I will consider this 'new' heritage practice in relation to my own study of two communities of interest, and in particular the increasing use of digital technology as a potential means of empowering heritage communities to record and express their own heritage values.

Heritage: from object to process

Traditionally, heritage practice has been largely centred on the objects of heritage themselves and their expert-led technical conservation, interpretation and subsequent display for the purposes of cultural consumption (Waterton and Watson 2015: 1). This emphasis on material culture and a *de facto* assumption of the innate value of certain historical objects can be traced in part to the influence of disciplines such as archaeology, art history, architecture and anthropology in providing the theoretical basis for early heritage practice (Waterton and Watson 2013: 548). Though heritage has been practiced by human societies across a far

longer temporal scale than popularly imagined (Harvey 2001), its 'modern' guise is often tagged to the emergence of a suite of national and international heritage policies, charters and recommendations in the late nineteenth and early twentieth centuries across Europe and the United States. These texts, such as the Ancient Monuments Protection Act of 1882 in England, the Federal Antiquities law of 1906 in America, and the Regolamento of Italy in 1909 emerged alongside the rise of nationalism; with material buildings and objects providing a tangible means of demonstrating the endurance of the nation by recourse to a glorious past (Waterton and Watson 2015: 3). From these legislative foundations, explicit heritage research and resulting publications began to emerge throughout the 1960s and 1970s, primarily through the lens of related subjects such as museum studies, archaeology and tourism. As such, the theoretical focus tended to fall on the objects of heritage and the managerial aspects of their display and popular consumption. As Waterton and Watson state, "this was almost inevitable as heritage objects came to represent an authorized version of the past in places and spaces that were prepared for visitors. Museums of course, became more and more a part of this practice" (2015: 4).

In the 1980s, academic critique began to emerge (particularly in the UK) of the primarily operational concerns of the 'heritage industry', and the inherent assumptions and biases that underpinned its commodification of the past; "a past sealed off from the present by its representation as an achieved state, a refuge, perhaps, from more contemporary travails" (Waterton and Watson 2015: 4). Significantly, this critique of heritage practice did not emerge from those professionally and academically concerned with the 'things' of, or theories *in* heritage, but those that drew from cultural studies perspectives such as Lowenthal (1985 The Past is a Foreign Country) to engage at an ontological level with heritage and construct theories of it, "that moved thinking about heritage away from its objects towards its social and cultural context and significance" (Waterton and Watson 2013: 550). These theories of heritage reflected the dominant theoretical movements of the time and as such western Marxist structuralism, post-structuralist/post-modernism, constructivism and postcolonial theory were all brought to bear on the project of 'deconstructing' heritage (Waterton and Watson 2013: 550), much in the same way that Cosgrove and Daniels employed semiotic theory to decode the veiled power relations that lay behind cultural representations of landscape (1988). In essence then, the emergence of a critical approach to heritage from the 1980s onwards contextualised its technical and managerial practices within a wider web of cultural meaning, exposing the 'work' that heritage does beyond its ostensibly value-free and benign representations. As Waterton and Watson state:

...theories of heritage were – and continue to be – concerned with questioning the representation of meaning, especially hegemonic meanings, about a past that effectively validates a national present or re-inscribes it with essentialisms when it might be considered to be under threat from economic restructuring, changing social attitudes or the nationnegating effects of globalisation (2013: 550).

A significant disciplinary call to arms for a more critical, 'socially aware' heritage studies was further advanced in a research report by Avramie *et al* (2000), in which the authors call for a holistic, multi-disciplinary approach to heritage conservation which integrates and contextualises "the spheres and work of conservation, not only as a self-contained science or technological endeavour but as a social practice" (2000: 6). The conceptual framework they suggested is one that defines heritage as a sociocultural "politicized and contested" process, as opposed to "a static set of objects with "fixed meaning" (2000: 6):

...heritage should be considered a very fluid phenomenon, a process as opposed to a static set of objects with fixed meaning...Artefacts are not static embodiments of culture but are, rather a medium through which identity, power and society are produced and reproduced. Objects, collections, buildings and places become recognised as 'heritage' through conscious decisions and unspoken values of particular people and institutions - and for reasons that are strongly shaped by social contexts and processes (2000: 6).

Echoing Avramie *et al*, Harvey (2001) argues the case for 'heritage as a process' by pointing out that heritage has been 'done' well before pre-modern times (for instance during the Roman and Medieval periods), with changes in practice occurring in tandem with cultural shifts and technological improvements. This is in contrast to the perception of heritage practice as a particularly post-modern pursuit, with origins in the late nineteenth century preservation movement associated with William Morris and the Society for the Protection of Ancient Buildings. For Harvey, this nineteenth century emergence of a heritage sensibility, in fact, "represents but one strand of heritage practice, reflecting the perceptions, politics and assumed natural identities of its practitioners" (2001: 336). In highlighting the long temporal scope of heritage practice then, Harvey seeks to move away from the popular convention of understanding heritage primarily as a physical artefact or record, to a situated cultural process reflective of the political and ideological paradigms of a given period. Just as the idea of landscape shifted from that of a passive backdrop to a dynamic and relational

process then, so have conceptualisations of heritage shifted from object to process - "heritage as a process, or a verb, related to human action and agency" (Harvey 2001: 327).

Approaching heritage as a situated cultural process has thus encouraged a more critical appraisal of the term in recent years and the intellectual space for theories *of* heritage to emerge. Emboldened by the affective turn in concomitant disciplines such as landscape studies, "the last 20 years or so has seen the field develop from that of a niche for conservators and tourism experts—sometimes looked upon suspiciously by 'proper historians'—to that of a significant field of academic enquiry in its own right" (Harvey and Waterton 2015). Within this burgeoning field of heritage studies, publications such as Smith's *Uses of Heritage* (2006) and her notion of the "authorized heritage discourse" have been particularly influential in illuminating heritage as a value-laden cultural process. For Smith:

...there is, really, no such thing as heritage...there is rather a hegemonic discourse about heritage, that acts to constitute the way we think, talk and write about heritage. The 'heritage' discourse therefore naturalizes the practice of rounding up the usual suspects to conserve and 'pass on' to future generations, and in doing so promotes a certain set of Western elite cultural values as being universally applicable. Consequently, this discourse validates a set of practices and performances, which populates both expert and popular conventions of 'heritage' and undermines any alternative and subaltern ideas about 'heritage'. At the same time, the 'work' that heritage 'does' as a social and cultural practice is obscured, as a result of what I call the 'authorized heritage discourse' (2006: 11).

Parallels can be drawn here between the naturalizing effects of Smith's authorized heritage discourse in promoting certain cultural values, and the notion of landscape representation (or discourse) as a veil, behind which a network of social, political and economic agendas are hidden (Cosgrove and Daniels 1988). In a similar vein, Harrison's *Heritage: Critical Approaches* (2012) considers the ubiquity of heritage as a social, political, and economic phenomenon in the global era of the twenty-first century and argues the case that in its concern for the past, heritage is primarily "about our relationship with the *present* and *future*" (2012: 4). As such, heritage is recast as a contemporary process which "focuses our attention on our ability to take an active and informed role in the production of our own 'tomorrow'" (2012: 4). To do so, Harrison calls for a dialogical model of heritage decision-making which breaks down the bureaucratic divide between laypersons and experts by recognising the connectivity between people, objects, places and practices that does not distinguish between the natural and cultural (2012: 4-5).

In effect, the trend towards placing heritage in the realm of ongoing human action and agency has provided conceptual space to approach it as a phenomenon of the present, as much as the past. That is, heritage as a relational component of people's quotidian, embodied experience of place, whether it be the authorised, "overcoded heritage and ceremonial space" of museums and monumental sites (Edensor 2005: 845), or everyday local landscapes. In the study of heritage as a present-centred practice, the democratising, holistic concept of landscape has provided a valuable means of gluing together the various tangible and intangible elements that compose it. As Harrison *et al* observe:

...the steady rise of landscape as a unifying concept within which heritage (natural heritage as well as cultural) can be framed and made socially, individually and psychologically relevant brings us to the position where memory resides in topography as well as within memento, because landscape, perceptual and infinitely plural, is the only truly ubiquitous and wholly shared aspect of heritage (2008: 6).

In elucidating the quotidian, personal and practiced nature of heritage, landscape phenomenology provides a useful tool. As Harvey considers, the embodied approach of phenomenology is pertinent in heritage studies as it "foreground[s] material culture as a tactile and resonant entity within the experience of landscape-heritage...and is suggestive of an analytical shift towards the performative and practised" (2013: 155). By observing a phenomenological approach in heritage studies, the primacy of objects, representation and textual discourse as the main tools of analysis are challenged and the pre-eminence of expert knowledge in heritage practice is destabilised. That is, as the scope of material remains absorbed into heritage is broadened and its locus is brought closer to people's own experiences, the mediation of experts in the heritage process becomes less necessary (Harrison et al 2008: 6). Furthermore, for Crouch, a phenomenological and performative approach to heritage diffuses the notion that it is something fixed or linear. To elaborate, despite the apparent continuity of heritage in the form of buildings or cultural rituals, it is ultimately a phenomenological act, in which heritage is relational, multifarious and unstable; "a heritage 'landscape', like any landscape, emerges, occurs, in the expressive poetics of our spacing" (2015: 187). In this sense, heritage is more than cultural representation, an object or a bounded space, but is reconfigured as a relational part of living: "we bring to our participation in heritage a multiplicity of things, because heritage is not detached from the rest of our living, but bound up with it, so that 'bringing' is related to our affective experience, our emotion and feeling" (Crouch 2015: 188). In conceptualising my own research as two situated examples of heritage landscaping then I am seeking to express and

mobilise the constructive synergies between the landscape and heritage concepts when approached as mutually enforcing contingent processes (Harvey 2015).

One sphere of landscape-heritage in which the role of expert knowledge is less entrenched, and the phenomenological aspects of embodied experience are to the fore, are the "latent spaces" (Desilvey and Edensor 2012: 475) offered by ruinous, or post-industrial landscapes. Just as landscape has been utilised as a means of reinterpreting heritage; in this case, it is heritage that can be reciprocally employed towards a more "nuanced, situated and fluid" understanding of landscape which moves away from the idea of landscape as palimpsest (with a retrospective, linear chronology) to one in which past, present and future are in an unfolding and ongoing, prospective relationship (Harvey 2013: 154-155). Such an approach is especially pertinent with regards to heritage landscapes which are ruinous and/or postindustrial in nature, as a means to move beyond the 'dead-end' or, 'done-deal' decisions leading to economic and social abandonment. Storm (2014) for instance, proposes the concept of a 'scar' to replace that of palimpsest when dealing with post-industrial landscapes. For Storm, her scar metaphor has a powerful "narrative potential" (2014: 1), to acknowledge the complex and often hurtful pasts of post-industrial landscapes and their associated communities, while providing a conceptual space for reconciliation and reinterpretation:

...the scar metaphor offers a way to overcome the many dichotomies of change—before and after, winners and losers, progress and decline—and create integrality instead. It is organic and created on the basis of past significances entangled with present standpoints. Because of this integrative perspective, and because it acknowledges nonlinear temporalities, the scar can be regarded as an alternative to a palimpsestual approach (2014: 3).

The potential of such sites to generate sympathetic and imaginative reinterpretations is exemplified by projects such as the Gasworks Park in Seattle and the Landschaftspark Duisburg-Nord in Germany, where industrial infrastructure was retained and reimagined as recreational parks (Worpole 2013: 74). Storm states that her focus on post-industrial landscape scars "makes clear that crucial memory and heritage processes can take place without any professional heritage actors involved" (2014: 6). This celebration of the subjective and non-expert can be read as a riposte to traditional landscape-heritage management plans produced through academic and expert cultures that tend to override the ideas and values of local communities (Harvey 2013:155).

The link between memory and heritage is fundamental. As Sather-Wagstaff considers, "heritage, understood as a social and discursive construction, simply cannot exist without individual memory and memorywork-in-action in the everyday world" (2015: 191). In this sense heritage can be considered as a "thoroughly social and political", selective process of remembering (Edensor 2005: 830). For example, heritage and museum spaces seek to banish ambiguity and fix a particular narrative for certain historical periods through the selective interpretation and display of certain objects; while monuments and war memorials construct specific sites for sanctioned performances of collective remembering (Edensor 2005: 830-831).

For Edensor, the disordered landscapes of industrial ruins and the affective, sensuous, spectral memoryscapes they evoke, "act as an antidote to the fixed, classified, and commodified memories purveyed in heritage and commemorative spaces" (2005: 829). In confronting such marginal landscapes and the tumbled, jostled materialities therein, memory is revealed as a "disorganised matrix"; momentary flashes and flares evoked by encounter and perception as opposed to the imagined linearity "and fixed memories of overcoded heritage and ceremonial space" (Edensor: 2005: 845). The chaotic memoryscapes of ruined spaces invoked by their lack of spatial ordering or maintenance thus challenges the "fixed memories of the past proffered by the powerful", and instead shows the manner in which the past is a source of "mystery and radical otherness" (Edensor 2005: 847). Though neither of my place-based studies are ruins *per se*, they have both had episodes of neglect which invite consideration. Furthermore, in its focus on non-expert values, non-linearity, and the phenomenological, a 'ruin-sensibility' is well suited as a means of approaching the entanglements of time, place, practice and memory that constitute the process of heritage landscaping.

Community heritage

Though my two case studies of heritage landscaping possess differing characteristics, they can both be categorised as examples of 'community heritage' in which the notion of 'social value' plays a key role. The emergence of community heritage and more recently social value as defined categories of interest within heritage practice, is indicative of the aforementioned turn towards approaching heritage as a situated cultural process in which communities of interest play a key-role in generating and incubating heritage values (Jones

2016). Accordingly, I will consider the associated notions of community heritage and social value in turn.

Within the heritage sector, the principle of community engagement and participation has emerged over the previous few decades to become a cornerstone of policy and practice - "an integrated part of the cultural resource management process, backed up with the appropriate legislation, the activities of various official and semi-official heritage organisations and notions of best practice" (Waterton and Watson 2010: 1). Such an outcome is evident in the remit of organisations such as the Heritage Lottery Fund, whose website states that, "we fund all kinds of projects, as long as they help to create positive and lasting change for people and communities". The prevalence of community participation in heritage practice is reflective of its wider currency in UK public policy (particularly following the election of the New Labour government in 1997); acting as catch-all term for the political ideals of regeneration, social inclusion, civic engagement, civil renewal and community sustainability (Waterton and Smith 2010: 6).

Despite the prevalence of community-based forms of heritage practice and its assumed 'goodness' in opening-up the heritage process to non-expert voices, Waterton and Smith argue that due to the uncritical manner in which the term is wielded (as a solution, rather than something to be explained) more often than not, 'community' acts as a veneer behind which traditional expert-led models of heritage practice prevail (2010). That is, by equating community with unquestioned notions of nostalgia, consensus and homogeneity, the dissonance and nuances inherent to communities (as well as their heritage values) tend to go unrecognised. As they state:

...the way that ideas of community have become intertwined with heritage discourses and practice has rendered communities, as much as their heritage, as *subject to* management and preservation. That is, community or group identity becomes the object of regulation through the heritage management process, not only reinforcing the power differentials in community—expert relations, but also ensuring the legitimacy of essentialist notions of 'community' and their continual misrecognition (2010: 11).

In a similar vein, Riley and Harvey point out that community-based approaches to landscapeheritage (in this case a community project regarding oral histories in Devon) tend to centre around the communication of scientifically constructed and expert-directed knowledge about a landscape or artefact *to* the community, as opposed to a model in which community, lay and non-expert knowledge is effectively valued and incorporated (2006: 279-280). Comparisons can be drawn here with Dalglish's criticisms of the gap between rhetoric and reality in implementing a truly democratic approach to landscape management in policy and practice (2018). While framing my two place-based studies as examples of 'community heritage' then (in the sense that the heritage values associated with both places has emerged largely outwith professional practice), I use the term 'community' somewhat loosely. That is, treating the rock-climbing community of Dumbarton Rock, and the community of interest surrounding the Great Polish Map of Scotland not as uniform, homogenous or fully coherent 'objects', but (akin to landscape and heritage) as fluctuating social processes, "through which people construct and create identities, and bond themselves to others, whether geographically, virtually or imaginatively" (Waterton and Smith 2010: 8). Indeed, as well as being geographically situated 'in practice', both communities of interest maintain online platforms, providing a virtual 'community space' which can be accessed by individuals regardless of time or location. Rather than considering the communities of interest within my own research in terms of the radical, political alterity of 'otherness' described by Waterton and Smith (2010) then, I approach community as "a focus on particular important places in the landscape...which local people 'work' to produce through a series of social relations" (Harrison 2008: 180).

Social value

Within the long-established (albeit contested) principle of community-engagement, and the desire to expand the scope of heritage practice beyond the spatial confines of special designation (Fairclough 2008), the notion of "social value" (Jones and Leech 2015) has emerged as a means of better apprehending the shared worth and cultural utility of the historic environment to communities, whose values may lie outwith or in juxtaposition to the official narrative or "authorized heritage discourse" (Smith 2006) surrounding historic sites or monuments. The contemporary emphasis in public policy and conservation practice on these often-intangible social values associated with the historic environment (as distinguished from the scientific, historic and aesthetic values that underpin traditional heritage practice), can in part be traced to the influence of the Australian *Burra Charter*, first published in 1979. In trying to better cope with the intangible, experiential basis of indigenous Australian heritage, *the Burra Charter* placed cultural value at the heart of the conservation process, stating that "places of cultural significance enrich people's lives, often

providing a deep and inspirational sense of connection to community and landscape and to lived experiences" (ICOMOS Australia 1999 [1979]: 1, in Jones 2016: 3). In defining 'cultural significance' as the sum of a set of interlocking values including aesthetic, historic, scientific, social or spiritual value for past, present or future generations; in theory, the *Burra Charter* placed social value on an equal footing with the aesthetic, historic and scientific values that traditionally underpin the heritage process in a Western context (Jones 2016: 3). Subsequent legislation such as the European Landscape Convention has also been influential in this regard, emphasising the social and communal aspects of heritage and the need to assess landscapes (and by association, heritage) in terms of "the particular values assigned to them by the interested parties and the population concerned" (Jones 2016: 3).

In an AHRC-funded research project report titled *Valuing the Historic Environment: a critical approach to existing approaches to social value*, Jones and Leech describe social value in the following terms:

Encompassing the significance of the historic environment to contemporary communities, social value relates to people's sense of identity, distinctiveness, belonging, and place, as well as forms of memory and spiritual association. Particular attention is focused on the modes of experience, engagement and practice that inform people's relationships with the historic environment (2015: 2).

Harris' (2011) work offers an illustrative example of social value figured as the focus of research inquiry. Harris examines the case of a realist, figural sculpture in Perth, Western Australia which transcended its designation as an official piece of government art to become a site of "unsanctioned community performance" (2011: 214). The sculpture in question is a life-size statue of a 1940s female swimmer (christened *Eliza* by locals), erected by the local council to commemorate the former site of Crawley Baths. Demolished in 1964 before "heritage legislation offered protection" (2011: 216), Harris notes that there was no marker of the baths until the erection of *Eliza* in 2007, despite their notable architectural style and scale, and broader social connection to the popular Western Australian pastime of recreational swimming (2011: 216). Harris describes the way in which the sculpture transcends its initial memorialisation purpose to become a site of playful community transgression. Through the continued dressing and re-dressing of *Eliza* to reflect current events (such as a yellow jersey during the Tour de France, or a surgical mask at the beginning of the H1N1 flu outbreak), *Eliza* became a topic of daily discussion amongst locals and generated significant public affection. Harris contrasts this outcome with that of most figural

monuments within cityscapes which tend to go unnoticed and "fail ultimately to protect and enrich collective memory" (2011: 214). The public affection shown for *Eliza* is thus used by Harris as a means to consider "broader heritage practice and its over-emphasis on aesthetic and historic values at the expense of the vitality of social value" (2011: 217). To counter this traditional emphasis on aesthetic and historic values, Harris states that "audience activity at *Eliza* reminds us of the importance of everyday local identity, affection and accessibility to heritage fabric - all key aspects of social value" Indeed, the social values generated by local communities in relation to the historic environment often overwrite the original meanings proscribed to particular monuments or landscapes, such as in the case of *Eliza*, or more locally, the category-A listed Duke of Wellington statue in Glasgow city centre, which has been playfully appropriated (by way of a traffic-cone hat) to celebrate the 'gallus' humour of the city's inhabitants.¹⁶

In its focus on non-expert communities of interest and the intangible, fluid, ongoing aspects of heritage, social value provides a useful conceptual framework for my own explorations of localised heritage landscaping. In its recognition that "practice and experience provide the locus for the creation of meaning in relation to the historic environment" (Jones and Leech 2015: 34), social value brings a 'landscape perspective' to heritage. The notion of social value gains particular traction at Dumbarton Rock, where a subaltern climbing heritage has emerged via decades of aggregated practice, outwith the Rock's official designation as an Ancient Scheduled Monument. Though in contrast the Great Polish Map of Scotland is more commensurate with the tangible, aesthetic and historic values that underpin traditional heritage practice, its rescue and restoration was driven by the social values generated by a non-expert community of interest for whom the (largely intangible) practice and experience of landscape provides a key point of reference.

Notably, despite the increasing prevalence of social value and related forms of public participation in the guidelines of heritage bodies, in practice, it remains marginal to the scientific, historical and aesthetic values that traditionally underpin the heritage process (Jones 2016). This is in part due to a lack of resources and relevant expertise for the effective investigation of social values within routine conservation and management, as well as the fact that social values are hard to quantify as measurable benefits for the satisfaction of state-sponsored heritage funding programs (Jones 2016: 4). Furthermore, at a 'deeper' existential level, Jones notes that "the dynamic, iterative and embodied nature of people's relationships

with heritage places pose a more fundamental challenge to how we conceive of, and indeed practice, heritage", requiring engagement with the far-reaching tensions that exist between the idea of heritage as immutable and fixed on the past, with that of a dynamic, mutable heritage fixed on the present (2016: 13). As discussed, similar tensions between stasis and dynamism, past and present, also pose challenges within landscape policy and practice. As one of the key early arenas in which the performative turn played out (as well as its interconnectedness with heritage), landscape thus provides a useful means of apprehending the social values of heritage places. In this sense, social value provides an appropriate conceptual linkage between the 'heritage' and 'landscape' of heritage landscaping. Indeed, with its focus on the embodied, experiential aspects of people's relationship to the historic environment, we might consider social value as a contemporary manifestation of the performative turn within heritage policy and practice.

Digital heritage

In the pursuit of meaningful public participation in contemporary heritage practice (via notions such as social value), digital technologies are increasingly employed. As Purkis notes, "actively creating new digital heritage content about ordinary people's life histories is an important part of the democratisation of heritage by encouraging participation and engagement with the public" (2017: 434). As well as digital technologies allowing for new approaches to the curation and display of "intangible life stories" in a museum or exhibition context (Purkis 2017), they are also considered as a means of representing unofficial communities of interest via the co-production of 3D visualisations of the heritage objects around which they orbit (Jones et al 2017). Due to the centrality of 'authenticity' to the heritage process, which "haunts the practices of preservation, curation, management and presentation enacted on monuments, buildings, places and artefacts" (Jones 2010: 182) the increasing prevalence of three-dimensional (3D) digital 'copies' of heritage objects has raised interesting questions in relation to their materiality, authenticity and aura (Jeffrey 2015). For some academic commentators, this focus on whether 3D digital heritage objects are authentic or not, "obscures the wider work that such objects do in respect to the cultural politics of ownership, attachment, place-making and regeneration" in the context of community co-production (Jones et al 2017). Such contemporary debates surrounding digital heritage are relevant to my situated studies of heritage landscaping, as both have been given the 'digital treatment' and recorded via 3D visualisation technologies (namely

photogrammetry and laser scanning). At Dumbarton Rock, digital technologies were utilised during the collaborative Archaeology Community Co-Production of Research Data Project (ACCORD) in 2016, as a means of representing the "marginal" heritage of its associated climbing community (Hale *et al* 2017), while an interactive 3D digital model of the Great Polish Map of Scotland was launched online by Historic Environment Scotland on the same day of the 'real' map's official opening in 2018.¹⁷ Both these instances of digital heritagework at Dumbarton Rock and the Great Polish Map of Scotland will be considered alongside the broader process of heritage landscaping in their respective empirical chapters, both in terms of their (im)materiality as digital objects, as well as their efficacy in representing the social values which underpin their real counterparts.

Summary

In this conceptual literature review I have sought to contextualise my research with contemporary approaches to the primary concepts of landscape and heritage which frame it. Over the previous twenty years or so, both landscape and heritage have undergone a broad conceptual transformation from being considered primarily as bounded material objects to ongoing cultural processes, which has led to a democratized understanding of practice. In this turn to the 'processual', the conceptual and methodological developments of NRT and landscape phenomenology have played a key role in "the increasing awareness (and celebration) of both landscape and heritage as subjective phenomena" (Harvey 2015: 912). As Harvey and Waterton state, "in both fields, an expanded ontological and epistemological frame has been cast, which has lent much needed space to alternative renderings and readings—the intangible and affective; the personal and quotidian; the hybrid and haptic" (2015: 906). Engendered largely by the impact of the performative turn within academia, this processual approach to landscape and heritage has also influenced policy and practice. Though confined largely to the domain of policy rhetoric as opposed to meaningful implementation, their presence has nonetheless unsettled expert-led models of conservation and management and the pursuit of universal values in both landscape and heritage practice.

Harvey considers the recent conceptual trajectories of landscape and heritage as "a mutually supporting and often parallel endeavour of academic, policy and popular inquiry" (2015: 911), with cross-pollination occurring due to the inherent synergies between the two concepts. Broadly, a landscape perspective has allowed heritage scholars to appreciate the

affective, embodied aspects of heritage as a relational part of living; and by activating the past, a heritage sensibility has propagated interpretations of landscape that are attentive to the role of memory in the experience of landscape beyond the here-and-now (Harvey 2015). For Harvey (2015), further conversation between the two is desirable - countering the tendency of more-than-representational accounts towards solipsism and presentism (Jones 2011). In framing my two situated enquiries as acts of heritage landscaping, I am seeking to convey the mutuality of the two concepts as well as their embodied, processual and ongoing nature as 'doings'. By approaching heritage with a landscape perspective, and landscape with a "heritage sensibility" (Harvey 2015: 913), a more nuanced understanding of both can be achieved. Due to its attentiveness to the vagaries of time and place, geography has been "one of the natural disciplinary convergences between landscape and heritage" (Harvey and Waterton 2015: 909), and as such, provides an ideal disciplinary stance from which to investigate two contemporary and compelling examples of heritage landscaping in Scotland.

3. Methodology

With the recognition that landscape and heritage are largely subjective phenomena, qualitative research methods present themselves as the most suitable means of gathering relevant 'data' for their exposition, particularly with regards to their more intangible, experiential qualities. In my exploration of two instances of contemporary heritage landscaping in Scotland then, a selection of qualitative research methods were employed which I felt would best capture the nuances of each site. These methods will be discussed in turn.

Before considering each method on an individual basis however, it is important to reiterate the overarching influence of a 'performative approach' upon my research methodology. That is, a 'performative approach' as shorthand for a phenomenologically grounded, more-thanrepresentational attitude. As described in the literature review, inherent to many performative approaches to landscape is an underlying phenomenological ontology, providing a "conceptual platform from which landscape can be understood in terms of phenomenological ideas of bodily practice, dwelling and inhabitation" (Wylie 2013: 60). Indeed, a key synergy between geography and performance studies has been this shared view on "landscape as lived" (Rogers 2012: 62), with phenomenology highlighting the manner in "which body and environment fold into and co-construct each other through a series of practices and relations" (Wylie 2007: 144). Attention to these practices, or "embodied acts of landscaping" (Lorimer 2005: 85), has thus occasioned a "broad methodological shift towards a more ethnographic and performative ethos" within landscape research and beyond, as a means of better dealing with the subjectivities of lived experience (Wylie 2007: 166). As Witcher et al note, "in response to the scholarly emphasis on representation, the recent 'material turn' in the social sciences has looked to embodiment and phenomenology as both philosophy and methodology" (2010: 118).

The notion that to apprehend a landscape effectively, one must have experience of it, is also one that informs the systematic, 'scientific' approach of Landscape Character Assessment which utilises supplementary field-surveys to provide "the important ground level view that shows how the landscape is seen by people" and to help record the "aesthetic and perceptual qualities" of a given area (Swanwick 2002: 30). Such an outcome is evident in heritage

studies too, where recent interest in the largely intangible social values of heritage places has occasioned a methodological shift towards a qualitative framework. As Jones states: "To gain an understanding of social values it is necessary to carry out research with communities of interest using qualitative methods derived from sociology and anthropology. These methods involve the use of various techniques, for instance focus groups, qualitative interviews and participant observation, to reveal the meanings and attachments that underpin aspects of social value" (2016: 6). As can be seen then, qualitative methods are well suited not only to landscape research, but explorations of heritage too. As such, they provide an appropriate methodological framework for my own situated inquiries of localised, heritage landscaping, allowing me to critically and creatively express the tangled "relationships between biography, history, culture and landscape" that underlie them (Wylie 2007: 206).

Landscaping: participant observation/autoethnography

With embodiment and phenomenology providing both an ontological and methodological basis to my site-specific research, the primary fieldwork method I employed was that of participant observation and ethnography. "Being there" (Philo 2004: 8), allowed me to achieve a participatory intervention in, and critical understanding of, my two research sites; treating them respectively as social situation, material process, temporal event and lived reality. The broadly ethnographic approach that underpinned my research was appropriate to its site-specific, 'peopled' nature. As Cloke *et al* note, ethnography "treats people as knowledgeable, situated agents from whom researchers can learn a great deal about how the world is seen, lived and works in and through 'real' places, communities and people" (2004: 188). Though the specific terms of my engagement with each site differed, my approach in each case was united via the 'fieldwork principles' of observation, description, sensation, practice and performance, allowing me to understand them as two contrasting, but related instances of heritage landscaping.

With regards to the Great Polish Map of Scotland, I undertook my fieldwork in the capacity of a volunteer-researcher with 'Mapa Scotland' – a small-scale charitable body founded in 2012 with the aim of physically restoring the Map, as well as promoting its worth as a cultural and educational resource. My involvement with Mapa Scotland was based primarily around my attendance at several working parties throughout the Map's restoration period. Importantly, attendance at these working parties allowed me to get up-close and hands-on

with the Map's complex concrete materiality, and to immerse myself in its miniaturised vastness. This privileged, proximate access was integral to fulfilling the phenomenological ambition of my research project, allowing me to look and feel outward *from* the Map, as opposed to the more passive visual spectacle of the 'outside observer', determined by its encircling perimeter fence and viewing tower. In exchange for this privileged access to the Map I provided time and labour towards its physical restoration, with the majority of the working parties I attended taking place during the re-sculpting phase of the Map's concrete topography. The tactile, rhythmic and creative aspects of this re-sculpting work provided an ideal means of getting 'down and dirty' with the Map, enabling me to encounter it as a "taskscape" of sorts (Ingold 2000), as well as get closer to the embodied experiences of its creators and builders in the mid-1970s.

The camaraderie that emerged through working parties also allowed me to observe and getto-know my fellow volunteers, with conversations often taking place while working on the Map as well as during tea breaks in the shed (or 'site office'). The small number of corevolunteers (about six on average) enabled close working-relationships to form. Throughout my fieldwork period at the Map, a detailed fieldwork diary was maintained with my observations of working parties providing a useful resource for later reflections. The form of my field notes was purposefully eclectic, with observations ranging across the senses from the content of specific conservations, to the bodily aches left over after a day's labour. To supplement these field notes I also utilised photography as a means to capture the proximate materiality of the Map (its substance, form and texture) as well as the manner in which changing light and weather conditions affected its atmosphere and appearance. For instance, overcast skies would accentuate the dull grey of its concrete and 'flatten' its topography, while angled sunlight would bring it into sudden, brilliant relief. As well as my participation in working parties I also represented Mapa Scotland at the 2017 Heritage Forum of Central Europe in Krakow, presenting a paper on the Map in the city in which its story began, as well as establishing research contacts in the Jagiellonian University's Institute of Geography (where its creator, the late Kazimierz Trafas spent much of his career). I also collaborated with Historic Environment Scotland in the creation of a 3D interactive digital model of the Map, launched online on the same day of its official reopening in 2018. Advocating for the Map in this manner allowed me to contribute to its restoration beyond my attendance at working parties, allowing me to 'give back' to the project as well as 'taking' from it, in the form of valuable research data.

While also utilising participant observation and (auto)ethnography at Dumbarton Rock, my positionality was that of a researcher-practitioner, as opposed to a researcher-volunteer. Thanks to this identity, the terms of my engagement with the Rock as an instance of heritage landscaping was on a more individual, personal basis than the Map. In large part, this is due to my long-term, intimate association with the Rock as a practicing rock climber. In effect, my participatory research at the Rock consisted of "being there" (Philo 2004: 8) regularly during my fieldwork period, either climbing alone or with fellow climbers, with the Rock shifting somewhat from a landscape of leisure to a landscape of labour.

The act of rock climbing itself is one that, out of necessity, empties the head of any thoughts beyond the kinaesthetic (Sanzaro 2013). However, it occurs within a longer temporal sphere of dwelling in which other aspects and frequencies of the landscape come into focus and tune. These extended periods of dwelling, punctuated by the embodied practice of rock climbing allowed me to reflect upon the nuances of the Rock's climbing taskscape, as well as reflect on the manner in which conceptual renderings of landscape (such as landscape-astext and landscape-as-body) could enable a greater understanding of the manner in which the Rock's climbing landscape and associated heritage operates 'on the ground'. In addition to climbing, I also spent time at the visitor attraction of Dumbarton Castle in order to consider the official historical narrative of Dumbarton Rock in contrast to the climbing culture that occurs on its flanks. The 'performative approach' underlying my participatory and ethnographic methodology at the Rock was one that dovetailed neatly with the inherently performative, embodied and tactile act of rock climbing itself (Lewis 2000). Indeed, the 'good-fit' between the tenets of landscape phenomenology and my longer-term personal experience as a practicing rock climber, emboldened my belief that landscape phenomenology provided the most intuitive and appropriate philosophical and methodological framework to my situated research at the Rock.

The culmination of my participatory fieldwork at the Rock was the planning and execution of an experimental, performative intervention. Utilising light-suits and long-exposure night-time photography to capture the performance of several boulder problems, a series of dramatic and dynamic photographs were produced in a bid to intervene in and visually expose the Rock's largely intangible landscape of movement and its associated heritage. While adopting a 'performative approach' to my fieldwork in terms of a general attitude and conduct, the staging of this creative and experimental form of "landscapism" (Edensor and

Lorimer 2015) allowed me to turn words into actions by deploying a more explicitly performative site-specific methodology. As Pearson (2012) carefully itemises, performance can:

- constitute a *methodology* for the examination and explication of the complexities of landscape
- be evocative in nature, drawing places out of the everyday through its physical presence and focussed aesthetic attention
- can enable integrations of academic research procedures and professional, aesthetic practices, in combinations of the creative and the scholarly
- enhance and inform public appreciation and understanding of places

After staging this performative intervention, the results were posted on the Dumby.Info Facebook page – an online hub for the Rock's climbing community with 669 followers. 18 This provided a useful means of sharing the photographs with the wider community of interest and to gather individual responses to them, upon which I could reflect. Though the scale and scope of my 'performative intervention' at the Rock might be judged relatively modest, from an aesthetic perspective the outcome was a success, with responses to the photographs highly favourable. It was also an important means of putting a 'performative approach' in my research 'into practice' as opposed to that of a more general standpoint, with the inherently more-than-representational, performative nature of the Rock's climbing landscape requiring a more creative, experimental means of explication. My belief that a small-scale creative intervention in landscape could produce dramatic results was bolstered by the work of Jaramillo (2016), in a project which utilised nothing more than an array of headtorches aimed skyward, to draw attention to the subterranean "hidden labour landscapes" and heritage of the former lead mines of Bonsall Moor in the Peak District National Park.

Lastly, my period of fieldwork at the Rock as a researcher-practitioner was enhanced during an Overseas Institutional Visit to the University of Melbourne. While studying in the city of Melbourne for approximately three months, I undertook regular climbing trips to the world-famous sandstone rock faces of the Grampians and Arapiles. Coming as a newcomer and outsider to these historic climbing destinations provided a valuable contrast to my experiences as an 'insider' at my 'home' climbing landscape of Dumbarton Rock, and the manner by which "popular climbing destinations are situated in larger networks of climbing

mobilities...such destinations develop reputations, referred to as 'scenes', that circulate across climbing media (magazines, websites, and films)." (Rickly 2017: 72). In particular, my reliance on the official rock-climbing guidebook for the region highlighted the prominent role that 'the guidebook' plays in the production of the climbing landscape-as-text, and its influence upon the act of climbing itself. Somewhat counter-intuitively then, gaining some distance from the Rock and experiencing a new climbing landscape, allowed me to more clearly think through my period of situated fieldwork 'at home' and the valency of its conceptual basis in a differing, but related climbing landscape.

In assuming a phenomenological, performative approach to my fieldwork (via the methodological tools of participant observation, (auto)ethnography, and site-specific creative response), one must be aware of the limitations and indeed, criticisms, of such an approach. For Duncan and Duncan, the proximate, relational, and immersive nature of "more radical phenomenological approaches [to landscape research] are clearly incompatible with a critical perspective which necessarily distances researchers from the objects of their research" (2010: 244). Due to its focus on the self and lived experience then, a phenomenological approach can lack the critical distance necessary to address "broader critical questions concerning the cultural, political and economic forces which shape landscapes, and shape perceptions of landscape also" (Wylie 2013: 59). One can also add historical forces to this list, with the concern that a phenomenological, non-representational approach leads to a form of "unintended presentism", (Harvey 2015: 913) and a "relative neglect of the trajectories of past-into-present" due to its overriding focus on living in the moment, or the "present moment of practice" (Jones 2011: 876).

While attentive to such criticisms and potential failings of a phenomenological, 'performative approach' to landscape research, it is my belief that despite such shortcomings, it remains best placed to explicate the subjective, processual aspects of heritage landscaping and the practice-based nature of each of my study sites. Indeed, As Harvey notes, approaching landscape with a "heritage sensibility" in this manner, can stave off the tendency of phenomenological methodologies towards presentism, allowing other 'voices' and temporalities to enter into the research conversation (2015). In this sense, while debates around methodological choices often suggest a zero-sum game (Fleming 2006), in practice, a mixed-methods approach is best placed to apprehend the multi-faceted nature of landscape and heritage. While adopting an underlying, and one might argue, inescapable,

phenomenological approach (due to the situated experience of human being-in-the-world), to build a 'ground-level' experiential understanding of each of my study-sites; I also sought to gain a more distanced, 'critical' perspective to consider the "various interconnecting ecological, corporeal, material, cultural, economic and memorial flows" that have shaped each place in time (Jones 2011: 876), via a consideration of their textual and representational forms. My efforts to both critically and creatively engage with my place-based studies of heritage landscaping can be related to Harrison's notion of "intimate distance" – a methodological stance which enables "a simultaneous sense of critical reserve and a creative engagement with the various fields we study" (Harrison 2015: 39).

Archival Research: make-do-and mend

In addition to my situated, participative research at the Rock and the Map, I also conducted archival research to produce a cultural biography of each place to account for their respective historical geographies. Though it is tempting to suggest for the sake of methodological clarity that my participative, ethnographic research addressed the present, phenomenological 'landscaping', element that constitutes heritage landscaping, and my archival research, by virtue of its focus on the sites' past, with the 'heritage' of each place, in reality, the two phenomena are experienced together, much in the same way that the past and the present are interwoven and unfold together (Jones 2011). Despite this reciprocity between past and present, there are of course "inherent difficulties in tracing ways of moving, feeling or performing in the past" (Lorimer 2003: 202). As Lorimer suggests however, the 'distancing', and indeed, 'deadening', effect of time upon the liveliness of past practices of landscape when encountered via the 'archive' can be lessened somewhat through the creative and imaginative interpretation of their representational documentation, allowing the researcher to get a little closer to the direct embodied experience that constituted their creation (2003). With this in mind, I sought to approach the respective 'archive' of each of my field-sites alert and attuned to the past embodied experiences that constituted them – an empathic endeavour in which my underlying, participatory research provided a key experiential resource and means of reference. As Merriman et al state, "reading and writing, not to mention photographing and archiving, are important practices embroiled in the performativities of many landscapes" (2008: 193). This holistic disposition towards approaching various representations of landscape as a corollary of their wider performance and practice, was one which resonated strongly at both of my field-sites, with processes of documenting, researching, recording, narrating and archiving through various means (writing, photography, film) taking place alongside, and indeed, 'through', the practical activities of dwelling.

The primary purpose of my archival research was to produce a cultural biography of each place, or in other words, 'tell their story', to provide context to my own situated research. Telling stories about people and places, is after all, one of the primary means by which we, as individuals and communities, make sense of the present and our place within it. As Lorimer notes, micro-scale inquiries of the biographies of people, animals, objects and ideas and the telling of their stories, has provided a bountiful and perhaps most importantly, relatable, mode and method of historical geographical praxis in recent years; "disclosing how in minutia it is possible to find small kingdoms of worldliness, and to craft short stories as outcrops of global history" (2010: 269). In seeking to tell the stories of the Rock and the Map, I had to draw upon their respective archives with a "make-do and mend" approach (Lorimer 2010), due to the fact that in neither case, does a singular archive exist in the traditional sense, which one can 'visit'.

The story behind the Map's construction is one intertwined with the presence of Polish troops in Scotland during World War II and the subsequent diasporic community who chose to remain and build a life in their adopted homeland after the ceasing of hostilities. The biographies of two members of this diasporic community, the Map's progenitor Jan Tomasik and his former commanding officer, General Stanislaw Maczek provide the popular backstory to the Map's creation, told through a collection of family photographs, documents and personal memories. Despite the novel undertaking of the Map's creation between the mid-to-late 1970s, there exists little in the way of documentary material beyond a small collection of photographs taken during its construction in 1975. These photographs are contained in a document entitled 'Szkocja w Szkocji' ('Scotland in Scotland'), written in 2005 by Janusz Szewczuk – one of a small team of Polish geographer-cartographers from Krakow's Jagiellonian University who laboured on the Map under the direction of the late Dr Kazimierz Trafas, and to whom the piece is dedicated in memoriam. This personal recollection, written approximately thirty years after the event, provides the only known primary account of the Map's construction.

The work of collating the patchwork of various sources that constitute the story of the Map's genesis and construction was one undertaken by its associated community of interest, who formally organised themselves as a charitable body, 'Mapa Scotland', in 2012. In effect, the 'Mapa Scotland' website provided an online archive of materials relating to the Map (such as historical photographs), as well as the popular retelling of its story through various articles written by its members.¹⁹ Though not academic in nature, these articles provide the 'authorised' account of the Map's story, which in effect, had been 'lost' when it was 'rediscovered' in the mid-1990s. The 'authority' of Mapa Scotland's account of the Map's past as a factual source, is evident in the manner it is rehearsed in various local and national media articles regarding its restoration.²⁰ In Mapa Scotland's collation of limited documentary sources to construct a legible historical narrative then, we see the 'work' that heritage entails, as something "constituted and constructed" - amounting to a form of discourse (Wu and Hou 2015: 39). With the 'popular' nature of Mapa Scotland's retelling of the Map's story and its wider purpose for promoting the Map as an important historical and cultural object, I thus had to be mindful of where conjecture and hearsay were filling the gaps left by the limited documentary evidence. Despite such concerns, in telling the Map's story as a component of this thesis, I am indebted to the resourceful "make-do and mend" (Lorimer 2010) historical research of Mapa Scotland in piecing together the scattered 'archive' of the Map's genesis and construction, which provided a vital starting point for my own inquiries.

While 'archival' sources regarding the Map proved to be somewhat limited, this lack of historic material was offset by a plethora of contemporary discourse online, which revealed not only the manner in which the Map is popularly presented - but perceived too. For instance, the Mapa Scotland Facebook page provided a useful insight into the wider community of interest surrounding the Map,²¹ while its associated TripAdvisor page (as a visitor attraction) provided hundreds of individual aesthetic and emotional responses to it, from which common themes were identified.²² While varying in length and content, these reviews amounted to a significant amount of qualitative data 'gathered' across the four years of the Map's restoration between 2014 and 2018 (equivalent to a sustained period of undertaking on-site questionnaires), offering a valuable insight into the memories, associations, feelings and opinions that the Map evokes and how it 'functions' as a tourist attraction, cultural symbol and historical monument. In addition to this rich data source, various media articles concerning the Map's restoration progress and ultimate relaunch,

provided an insight into the 'cultural narrative' utilised to provide context and meaning to the Map and its restoration. Indeed, the 'viral' appeal of the Map and its associated story is illustrated by a short BBC Scotland film short entitled the 'Hidden Map of Scotland' published on the organisation's Facebook page, which briefly describes (in a simplified and accentuated manner) the Map's backstory, ruin, rediscovery and restoration.²³ With approximately 3.7 million views, 31,000 likes, 22,613 shares, and 2300 comments this short video illustrates both the cultural appeal of the Map, as well as the rich veins of qualitative 'Below the Line' data available online when mined with a discerning eye.

In contrast to the limited source materials pertaining to the construction of the Map, the 'archive' of Dumbarton Rock's climbing history is contained in a series of climbing journals and guidebooks published since the mid-1960s. Thanks to the cultural habits of the climbing community which records significant first ascents in detail (name, grade, route description, date), and their subsequent publication in journals and guidebooks, a historical timeline can be traced across decades of practice, with distinct 'chapters' defined by the activities of leading generational climbers and wider cultural practices (with regards to climbing 'style' and ethics). Due to this careful self-documenting culture, the Scottish Mountaineering Club archive (containing the entirety of SMC Journals published between 1890 to the present day) located at Strathclyde University Library provided an obvious starting point for my archival research alongside various guidebooks published across the decades with reference to Dumbarton Rock. As well as the listing and description of individual climbing routes, guidebooks also tend to contain short historical prefaces regarding the development of a particular crag or region, providing a valuable backward glance over decades of aggregated practice. In constructing a cultural biography of Dumbarton Rock then, relevant journals and guidebooks provided a vital source of base information, containing concise narrative histories as well as the listing of relevant 'facts' in the form of the 'who, where and when' of first ascents.

Despite the utility of these sources however, I sought to delve deeper so as to construct a richer, fuller cultural biography of climbing development at Dumbarton Rock than that offered by the thumbnail history of existing guidebooks; one more attentive to the individual biographies and "small stories" (Lorimer 2003) that compose the Rock's climbing heritage, as well as the landscape itself. I was rewarded in this search by obtaining the very first, handwritten guide to the Rock written in the early 1960s by pioneering climber, the late

Brian Shields, via personal correspondence with his son, Jon Shields. In essence, these personal notes provide a snapshot of the 'big bang' moment triggering the Rock's development into a world-renowned climbing location, laying the cultural foundations for all those that proceeded. It was extremely valuable in this sense, allowing me to go back to the source of the Rock's rich climbing culture and add vibrancy to those formative years, which subsequent decades had rendered somewhat distant and detached. Bringing character and life to these pioneering years was made easier by the inclusion of several (hitherto unseen) photographs in the guide, illustrating the young Shields and his climbing colleagues in action on the Rock. While affording a compelling insight into the style, ethics and equipment of the day, these photographs also served as a reminder of the ultimately phenomenological basis of Shields' guide.

In addition to the Rock's archive, a significant volume of online discourse also provided useful data with regards to considering the wider community of interest that surrounds the Rock, and the manner in which it is portrayed (within and without climbing media) as a semi-urban, somewhat gritty climbing destination. For instance, the Dumby.info Facebook Page (with a 'membership' of 669), acts as an online community hub for the Rock's climbing community, providing a channel for relevant news, events, historical photographs and community discussion.²⁴ As an administrator of Dumby.info, it provided a useful channel through which to communicate with the wider community of interest that orbits the Rock (with page followers geographically disparate and diverse), and an ideal medium to 'exhibit' the photographic results of my site-specific performative intervention and gather individual responses to it. As well as photography, filmed footage provides a key means of representing the Rock's climbing landscape, with a wealth of videos available online in which amateur footage of climbs being performed is compiled, edited and set to music (in much the same manner as the 'skate' video genre). Furthermore, due to the visit of several high-profile professional climbers to the Rock in recent years to climb Dave MacLeod's world-class route, Rhapsody, the Rock and its wider climbing landscape is also featured in a number of professionally produced feature-length documentaries and shorter, sponsor-funded videos, all of which serve to project the Rock's climbing landscape far beyond its spatial boundaries and enhance its reputation as, variously, an exurban, hard, gritty, feared and unique climbing venue.25

In addition to the Dumby info Facebook page, the UK Climbing (UKC) website and forum, provided a useful research resource. Hosting an extensive database of the UK's crags and recorded climbs, UKC allows users to 'tick' off a completed climb in a virtual logbook, while submitting their opinion of it (as a subjective experience) and voting on its grade (to provide a community consensus). Photographs of routes uploaded by users also provide a significant photographic database of specific climbs. With 399 listed climbs complete with user feedback and photographs on Dumbarton Rock's associated UKC database page, it provided a rich vein of data with regards to the popularity and perception of specific routes.²⁶ For example, one of the Rock's classic traditional routes Windjammer Crack (established by Brian Shields in 1965) has been logged by 125 individuals, many of whom uploaded short subjective comments on their own experience. In effect, these comments are a direct response to the Rock's material qualities, providing a rich resource of individual qualitative experiences. For instance, a user named 'Pina' writes of Windjammer Crack - "Great to get this after backing off it 2 years ago under glassy conditions. Swallows big gear.". ²⁷ In these two short sentences then, we see the intimidating nature of the Rock's climbing due to its lack of friction and 'glassy' nature, as well as the technical requirement for multiple, largersized pieces of climbing gear (such as cams, nuts and hexes) to adequately 'protect' the route.

In addition to this online discourse from within the climbing community, a series of media articles written in reference to the 'graffiti-gate' of 2012 (in which the planned removal of graffiti at the Rock by Historic Scotland sparked protest from the climbing community), offered a rare example of 'local' climbing featuring in the mainstream media, and the manner in which the Rock and the values of its climbing community were reported to a non-expert audience (Williams 2012).

Interviews

Alongside my situated, participatory fieldwork, archival research, and discourse analysis, a series of semi-structured interviews were undertaken to provide more in-depth, personal information on various aspects of my research.

Attending an international conference in Krakow to deliver a paper on the Map provided the opportunity to meet two individuals from whom I could gain further, personal insight on the Map and its history. I was able to contact both of these individuals prior to my visit via email and arrange respective meetings. The first of these individuals was Janusz Szewczuk, a departmental colleague and friend of the Map's creator, Dr Kazimierz Trafas, who visited Scotland in the summer of 1975 as a student to provide extra labour. Though Janusz's basic, imperfect English and my non-existent Polish meant that much was lost in translation, I was able to gather valuable personal insights as well as some useful source materials (including Janusz's aforementioned account of the Map's construction with photographs). The second individual I met with was Dr Tomasz Trafas, the younger brother of Kazimierz, and former Polish Consul General in Edinburgh (a position which had enabled him to harness political and financial support for the Mapa Scotland restoration campaign). Due to Tomasz's good grasp of English and his close, personal connection to the Map, this interview proved particularly fruitful, with discussion ranging from the wartime origins of the Map's story and the biographies of key individuals, to personal memories of his older brother, Kazimierz.

With the aim of gaining more insight into the Map's rediscovery, restoration and relaunch, I also conducted a semi-structured interview with Keith Burns – one of the key figures in the formation of Mapa Scotland and Project Manager of the Map's substantial restoration campaign. Though having worked closely and conversed with Keith at several working parties, conducting a 'sit-down' interview post-completion allowed me to explore certain aspects of Keith's personal motivations in more detail and the work involved in advocating and campaigning for the "heritagisation" of the map (Klekot 2012), activities ranging from drumming up financial and cultural support, to overcoming unexpected engineering hurdles during the Map's challenging physical restoration.

In seeking to compose a cultural biography of Dumbarton Rock's climbing history with more depth and 'flesh' than the concise histories offered by existing guidebooks, I conducted a

series of semi-structured interviews with key generational figures. With each interview lasting approximately one hour, questions ranged from personal motivations to the wider 'scene' that surrounded the Rock at various times in its development. For some personal experience of the Rock's climbing scene in the 1970s, I interviewed Ken Crocket – a lifelong climber, guidebook writer and historian within the Scottish climbing community. For the 1980s period, I interviewed one of the leading climbers of the decade – Gary Latter, who brought new standards of difficulty to the Rock by 'freeing' the aid routes of the 1960s and 70s; reflecting a wider cultural shift in climbing at the time, away from so-called 'aid climbing' techniques. For the 1990s period I interviewed Andy Gallagher, who ushered in a new wave of hard bouldering and the arrival of 'sport' climbing to the Rock. In each case, these interviews provided a wealth of personal experience and anecdote (with oral and folkhistory forming a key aspect of climbing heritage), as well as other documentary sources such as personal notes, handwritten logbooks, annotated guidebooks, newspaper clippings, magazine articles and photographs, which allowed me to construct a rich, cultural biography of the Rock's climbing community. In particular, hitherto unseen historical photographs provided a compelling visual record, allowing me to evidence changes in fashion, climbing styles and the Rock's surrounding landscape (from industry to post-industrial) amid the unchanging presence of the Rock itself.

Summary

In conceptualising the Great Polish Map of Scotland and Dumbarton Rock as two separate, but related examples of heritage landscaping, a phenomenologically grounded methodology presented itself as the most suitable means by which to attend to the situated, experiential aspects of each as social situation, material process, temporal event and lived reality. In adopting the roles of researcher-volunteer and researcher-practitioner respectively then, I was able to develop a 'ground-level', experiential knowledge of each place, which also allowed me to handle their representational archival traces in a more empathic manner. In other words, I was familiar with the affective grounds from which their respective representations stemmed – as Harvey notes: "With both heritage and landscape studies, elements of contingency and context are crucial and provide an imperative that we both interrogate how the world is represented and acknowledge affective properties that lie beyond, or behind, standard modes of representation" (Harvey 2015: 912).

As well as a philosophical choice, my participatory methodology was also a practical one, with volunteer-labour at the Map enabling me privileged access to it (via working parties), and a means of becoming 'one of the team' with a voice in the Map's future. Similarly, my participatory approach at the Rock (borne of a longer-term association with it), provided the embodied knowledge and expertise necessary for the planning and execution of a performative intervention which I felt might make opaque the otherwise "invisible archaeology" (Hale *et al* 2017) of its climbing landscape.

Critiques of phenomenologically derived, non-representational methodologies point towards a tendency for solipsism and "presentism", with an overriding focus on the "present moment of practice" side-lining the role of the past-in-the-present as well as the experiences of others in a given landscape (Jones 2011). In adopting a phenomenological stance towards my research conduct and methodological design, it is of course unavoidable that I became the primary conduit and 'voice' for the narration of two situated examples of heritage landscaping. While fully aware of the criticisms and indeed, limitations, of my chosen methodological design, I have sought to include other voices within my research (via interviews), as well as attend to the co-mingling of the past-in-the-present (via a commitment to recovering historical narratives), which in effect, lies at the heart of the process I have termed heritage landscaping. Despite these efforts, I make no claim to having achieved an authoritative account or "last word" (Pearson 2006) in either place, and indeed, never set out to secure status as singular or authorised storyteller. What I have sought to do is provide an attentive historical geography and cultural biography of each place, ultimately informed by my embodied experience of each and an underlying conceptual commitment to landscape and heritage as deeply entangled, subjective phenomena which are vital to our making sense of the world around us. As Bender notes, while it is impossible to make any reasonable claims to the 'truth' of subjective phenomena such as landscape and heritage, it is a necessary contradiction that we tether ourselves to 'explanatory' conceptual frameworks that allow us to 'work through' the objects of our research:

On the one hand, I say that everything is subjective and relative, and on the other, struggling to contextualize the discourse, I retain elements of 'grand narrative'. I find this a necessary contradiction. On the one hand our understandings are both placed and changing; on the other, we marshal them to work for us, to answer to our current preoccupations. While we accept that we are not in the business of producing 'the truth', we have the right to position ourselves within the postmodern flux in order to produce something that feels true to us, and effective at a given moment in time (2002: 105).

4. Physical Graffiti: Heritage Landscaping at Dumbarton Rock

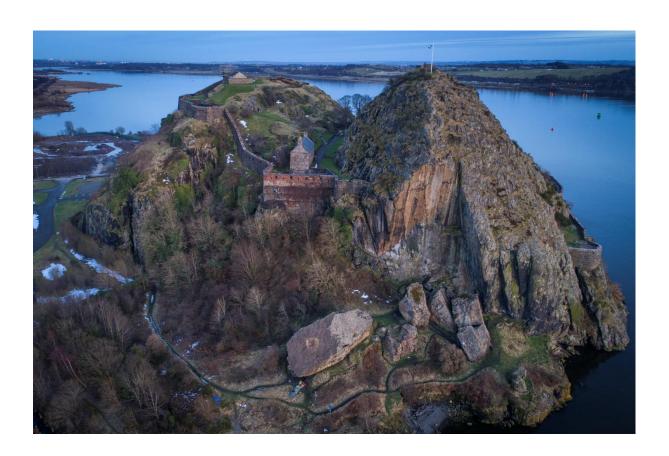


Figure 4: A drone's eye view of Dumbarton Rock from the north-west. The steep north-west face and the large boulders below provide the material focus for the Rock's climbing community (*Image: Chris Houston*)

Introduction

The first of my situated landscape studies is focused upon the relatively small but culturally significant site of Dumbarton Rock. Enshrined as an Ancient Scheduled Monument of national importance, the Rock (and the castle that nestles in a cleft below the summit) possess an incredibly long and storied history of military occupation, extending from the Dark Ages through to World War II. No longer a martial outpost, the Rock is ostensibly a place of the past, of deep time and bygone human ages, its dense geology symbolic of the sheer weight of time that has impressed upon place.

That the entirety of human history barely warrants a footnote within the Rock's geological lifespan provokes both a mortal dread and a reassuring connectivity to past events. Such places of permanence are special. They invite reflection and contemplation that allow the bystander to think beyond the realm of the everyday. They act as temporal lodestones that serve to solidify the nebulous past into a contemporary materiality which can be touched and apprehended. As Jeffrey writes of the "thrill of proximity" to past people and events that places such as the Rock evoke:

Each object, monument or place has a biographical chain of events that leads back from the present to its creation and each link in the chain is redolent of the people who handled the object, used the monument, or occupied the space. Our direct personal experience of the object, monument or place, is simply the latest link in the chain and somehow connects us to every other person on the same chain however distant they are in the past (Jeffrey 2015: 147).

The word heritage is a term often used to give expression to this special quality, or 'sense of place' that is present at locations such as Dumbarton Rock. By definition, heritage is a term that denotes an aspect of inheritance from the past and can refer to both material objects as well as intangible qualities. With the recognition that certain places possess a distinct or unique heritage also comes the notion that, due to their inherent qualities, these places must be managed in such a way that conserves and protects their 'historic environment' for the holistic benefit of society as well as future generations.

However, despite the Rock's contemporary cultural narrative as a place defined by the longue durée of Scottish history, it is also a place of the more-recent past, present and future; a place that possesses a modern history as well as a medieval one. For instance, since the early 1960s, the Rock's north-western aspect (see Figure 4) has nurtured a dedicated community of rock climbers, drawn to the hard climbing posed by its compact basalt. On this canvas, the best Scottish climbers of each generation have left their mark, with many of the Rock's first ascents breaking new grounds of technical difficulty both in Scotland and beyond. Based upon this accumulated six decades of dwelling, practice, and informal stewardship, in recent years Dumbarton Rock's climbing community have laid claims to their own distinct sporting heritage and 'rights to the Rock'.

These counter-cultural claims are in part reactionary; a reflexive response to Historic Scotland's campaign of graffiti removal at the Rock in the summer of 2012 (Williams 2012). Having largely co-existed in a state of benign indifference for decades (primarily due to the marginal nature of the Rock's climbing area in relation to its touristic operations), Historic Scotland's intervention into the fabric of the climbing area was felt by the climbing community to be a transgressive act; emboldening the notion that the Rock's climbing heritage should be officially recognised, and its associated community of practice consulted as legitimate stakeholders in the Rock's landscape. As opposed to the static, traditional heritage fabric located up above, the Rock's climbing heritage is based primarily upon ongoing, embodied interactions with landscape. In other words, it is a heritage 'of doing' as much as 'the done' - one based on performance as opposed to preservation. Although climbing guidebooks do provide a form of 'traditional' written history, its essence is intangible and fleeting, existing largely in practice, story and event. In contrast to the material culture orientated heritage of the castle above then, one can argue that the Rock's performative climbing heritage is more closely aligned to non-western forms of indigenous heritage based on oral history and experience, where it is the use of sites (as opposed to their supposed intrinsic values) that transforms them into "theatres of memory" (Smith 2006: 46).

In this chapter, I will consider the Rock's long-term use as a climbing destination as a form of incidental heritage landscaping, whereby decades of aggregated practice have led to the accumulation of a distinct, but largely intangible sporting heritage, with the medium of landscape playing a pivotal role. With the contemporary interest in landscape and heritage studies (and their respective policy arenas too) upon alternative values, and the processes and practices by which these are generated, the Rock provides a compelling and valuable place-based study. As Harvey notes, the "community turn" in heritage studies and the increasing democratisation of the heritage process "provokes us to turn away from the (elite) 'stuff' (of castles, monuments and museums) and look instead, towards the intangible and performative entities that have been of interest to phenomenological practitioners. (Harvey 2015: 917). In the case of Dumbarton Rock then, we are compelled to turn our gaze from

_

^{*} Now Historic Environment Scotland (HES) following a merger with the Royal Commission on the Ancient and Historical Monuments of Scotland (RCAHMS) in 2015.

the castle on top, to consider the intangible and performative qualities of its climbing heritage below.

To attend to the embodied, experiential nature of the Rock's climbing heritage, I drew upon a phenomenological methodology by which I embedded myself in the Rock's climbing landscape. The culmination of this fieldwork was the planning and execution of an experimental, performative intervention through which I sought to creatively abstract and represent the dynamic, intangible nature of the Rock's climbing landscape and associated heritage. While the Rock's climbing heritage unfolds and emerges primarily in the ongoing performance of its climbing routes as a form of situated heritage landscaping, it is important to avoid phenomenological "presentism" by attending to the manner in which the past is ever present - even in the present moment of practice (Jones 2011). With this in mind, I have chosen to narrate and sequence the story of the Rock through various "registers of memory" (Lorimer 2006) (geological, historical, personal and public) as a means of providing timedepth and social context to the 'nowness' of the Rock's climbing heritage. The structure of this chapter is thus episodic and polyvocal in nature, with the various geological, historical and social aspects that inform the Rock's contemporary heritage landscaping brought into conversation. As a structuring device, the chapter is split into Parts I and II, roughly approximate to the Rock's 'past' and 'present'.

In Part I, I consider the enduring nature of the Rock's geology and its storied history as a site of military occupation that defines its prevailing heritage narrative as a 'place of the past'. Following this, I offer a new cultural biography of the Rock's more recent history as an integral site in the development of Scottish rock climbing. With reference to this social history and a series of related climbing guidebooks, I then consider the processes of abstraction by which the Rock's climbing landscape has been 'textualised'.

In Part II I seek to contextualise the Rock's climbing 'landscape-as-text' through a consideration of its emergent, embodied properties. With reference to more recent events, I analyse the unfolding of the Rock's 'graffiti debate' in the summer of 2012 which led to the usually discrete worlds of the Rock's accepted heritage and its alternative climbing heritage being drawn into sustained conversation. I then consider my participation in the Archaeology Community Co-production of Research Data Project (ACCORD) at the Rock as a researcher-practitioner, and its efficacy as a novel means of apprehending unconventional

heritage and the social value of historic sites from the ground-up (Hale *et al* 2017). Following this, I detail my own experimentation with landscape and performative intervention as a means of creatively apprehending and evoking, the fleeting, embodied aspects of the Rock's climbing heritage. Seeking to draw these episodes together, I consider the Rock in the context of the New Scottish Landscape as a compelling and instructive example of heritage landscaping that contributes to critical conversations regarding the processual nature of both landscape and heritage.

Part I: Rock of Ages

A capsular history of Dumbarton Rock



Figure 5: *The Town of Dumbarton* by I. Clark, 1824. The painting shows the town during the heyday of industrial glassmaking by the local Dixon family. The prominence of the Rock as a local landmark is clearly reproduced by the artist (*Image: West Dunbartonshire Council*)

The purpose of this capsular history is to place my own original research inquiries within a longer arc of space and time, establishing geological, material, cultural and political themes which will be explored in later sections of the chapter.

Dumbarton Rock is a 350-million-year-old volcanic plug of fine-grained basalt, cast in the geological furnace of the Early Carboniferous period. Although its volcanic bulk has long since eroded, the Rock still rises abruptly over a surrounding alluvial plain, guarding the confluence of the River Leven and the River Clyde. Though borne of the deep time of geology, the Rock is lent a more quotidian temporality by the shifting tidal flats that surround

its base and the humdrum sounds of everyday life emanating from the nearby town. Visible for miles around, the Rock is a notable presence in the geography of the Firth of Clyde. Rising to 74m above sea-level, the Rock's profile from the north, east and south is lumpen and rounded, characterised by its twin peaks (the Beak and White Tower Crag) separated by a central gully. In contrast to these elephantine flanks, its north-western aspect is dissected by a sheer, overhanging rock face – resembling a tombstone that has leaned over with the passage of time. A collection of monolithic boulders are strewn below, the geological debris of earthquakes which shook the area 10,000 years ago as great ice caps rapidly melted and released their burden from the land below. In the mind's eye, it is just about possible to reverse this catastrophic event and put these blocks back, jigsaw-like, onto the rock-face (see Figure 4).

From a strictly geological perspective of deep time, the Rock's 1,500 year span in written history is insignificant; from a human perspective however, the Rock's permanence amongst the brevity of human life makes it thrum with consciousness – a sense wonderfully conveyed in the poem penned by Charles J. Kirk in 1911 (in Taylor 1981: 4):

Dumbarton Rock

The darkness hushes the town at my feet;
The dawn awakes it to life again,
With its clanging hammers and pulsing beat
Of joy and sorrow and peace and pain.
But I stand steadfast through dusk to dawn,
And brood o'er the days that are past and gone

The tides that fuss at my battered knees
And bind me round with the brown sea wrack;
I have watched them pass to the outermost seas
To greet the Trades or the grim ice-pack,
And carry the ships I have watched from birth
From Leven yards to the ends of the earth.

The stately liner and slouching tramp
Go splashing seawards or home again.
They're travelled gentry and bear the stamp,
Staring at me with a cold disdain.
But I greet them kindly by dusk or dawn,
And I muse o'er the ships that are dead and gone.

Boats of skin from the crannog town, The rowers naked and webbed of foot; Roman galleys with sails red brown, Norsemen laden with slaves and loot, Stately galleons of France and Spain, And privateers from the golden main Amid the melancholy of his poem, Kirk captures the enduring, sentinel-like presence of Dumbarton Rock as waves of human history lap and crash at its "battered knees"; its ongoing presence contrasted with the passing lives and journeying ships that constitute its storied maritime history. Indeed, an untold flotilla of ghostly ships have dropped anchor at its basalt base, some eager for sanctuary, others with belligerence in mind; while many vessels such as the famous *Cutty Sark* were built in the nearby shipyards before casting forth upon the world's oceans. So too, can Dumbarton Rock be thought of as a vessel of sorts. Although unmoving, it has borne successive waves of human occupants since time out of mind, and as Kirk's geo-poetic personification of the rock suggests, this human drama has endowed it with its own agency.

The human chapter of the Rock's story is likely to have begun in the Iron Age, with those eager for security drawn to its obvious defensive qualities of prospect and precipice. The Rock's recorded history stretches back 1,500 years with early literary references made to 'Altclut', a British name meaning 'rock of the Clyde' (MacPhail 1979: 5). For over 500 years, the Rock was the fortified centre of the powerful political kingdom of Strathclyde, a history echoed in the etymology of the place name Dumbarton - derived from the Scottish Gaelic 'Dun Breatann', meaning 'the fortress of the Britons' (MacPhail 1979: 5). With the Rock acting as a power base, the Kings of Strathclyde ruled over a territory extending north of Loch Lomond and as far south as Cumbria. Despite the popular imagination of the Dark Ages as a period of cultural regression and insularity, it appears that 'Alt Clut' was not just a regional powerbase, but also exerted a wider geographical influence. Indeed, archaeological excavations undertaken at the Rock in 1974-75 unearthed a large quantity of ceramic and glassware imported from Gaul, Germany and the Mediterranean in the 6th and 7th centuries AD, indicating that the Rock and its early Britons were part of a long-distance trading network (Alcock 1975).

A different geographical reality for the Strathclyde Britons was the proximity of Vikings, who ransacked the Rock in 870AD. A joint force led by Olaf 'the White', King of Dublin and Ivar 'the Boneless' (fresh from his capture of York), sieged the Rock for four months, wasting its occupants by hunger and thirst. An armada of 200 longships carried the spoils of war, including its now enslaved occupants, to Dublin (Tabraham 2005: 15). Despite the setback, the kingdom of Strathclyde gradually re-emerged in the tenth century until it was

eventually absorbed into a united Scotland in 1034 - a merger engendered when King Duncan of Strathclyde ascended to the Scottish throne as Duncan I (Tabraham 2005: 15).

With the ceding of Argyll and the Hebrides to Norway in 1098, the Rock became a frontier post, lying only 10 miles from the Norwegian border. Strained Scoto-Norwegian relations across the subsequent 150 years ensured that the Rock remained a place of significant geopolitical import. Due to this strategic importance, in 1222 Alexander II proclaimed the Rock a royal castle and founded the new burgh of Dumbarton nearby, as the fledgling Scottish kingdom attempted to wrest back control of the Hebrides. In the wake of the battle of Largs in 1263 (which saw another Viking armada sailing into the Firth of Clyde), King Magnus of Norway agreed a peace treaty with Alexander III returning the Hebrides to Scotland in 1266 (Tabraham 2005: 17).

If this drew an end to its function as a frontier post with Norway, the Rock remained strategically important, controlling shipping and trade along the Firth of Clyde. As such, the Rock and its castle were continuously occupied across the medieval period. Seized by Edward I during his invasion of Scotland in 1296, the 'Wallace Tower', located at the castle's north entrance from approximately 1500 until it was demolished in 1795 (see Figure 6), attests to the historic claim of Sir William Wallace's imprisonment at the Rock in 1305 after his capture by the Scottish nobleman and sheriff of Dumbarton Sir John Menteith (Tabraham 2005: 18). Nicknamed the *Fause Menteith* for his collusion with the English, an extant gargoyle head located on the castle's sixteenth century guard house is purported to be a likeness of Menteith; the grotesquery an effort perhaps to set treachery in stone for eternal condemnation.

In 1489, after wresting the castle from the rebellious John Stewart Earl of Lennox, James IV utilised the Rock as an important naval station from which he led numerous expeditions against the Lords of the Isles, rulers of the Scottish *Gàidhealtachd*. In the process, the town of Dumbarton was transformed into a bustling naval base, where ships were built, repaired and provisioned. As MacPhail states "The burgh, in the shelter of the king's castle, was conveniently situated for shipbuilding; it lay on the river Leven, a short distance from the river Clyde, and the woods of Lochlomondside. It was easily accessible from any part of central Scotland where the king normally resided and far enough from the isles of the west to escape any raids in reprisal" (1979: 35). The Rock's location on the western periphery of

mainland Scotland also provided a strategic point of conveyance from which to flee (or enter) Scotland by the back door; as was the case with the infant Mary Queen of Scots, who took refuge behind the castle walls before the arrival of four French galleys allowing her safe passage to the continent in 1548.

In the civil war that followed Mary's return to the country as an adult, the Rock was captured by notable means in the name of King James VI by Captain Thomas Crawford of Jordanhill. In the early hours of April 1st, 1571, Crawford undertook what – admittedly with some license for fancy - might be regarded as the first recorded climb on Dumbarton Rock. Leading a party of more than 100 men under cover of darkness Crawford ascended the northeast side of the Rock's eastern peak; 'the 'Beak'. Scrambling up a series of ledges, Crawford hauled up ladders with ropes, allowing his men to follow. Reaching the castle walls in the dawn's morning fog, with surprise and numbers to their advantage, Crawford's men quickly routed the castle garrison, expelling Lord Fleming of Cumbernauld, its keeper loyal to Queen Mary (MacPhail 1975: 70). Though doubtless embellished over the years as a tale of 'derring-do', Crawford's sortie provides a compelling historical snapshot of the Rock as a material object and an embodied reality; one echoed in its contemporary climbing culture. Reading between the lines of his testimony, the muttered curses and laboured breathing of his men surface, as they struggle up the precipitous terrain of the Rock's eastern flank:

We thocht it best to assay it at the same pairt, and swa we did, which is the last (most distant) pairt, called the Beike. And when we had knit the lederis of thriescoir of stepis, we wer yit xx stepis from ane trie that was above us; to the which trie the guide and myself wan to without ledderis, with grit difficultie, taking coirdis with us, and feschoned the said coirdis at the trie, and sua lating the coirdis hing doune to the ledderis, whairwith men mycht draw thaim sellis up to the trie (in Crocket 1975: 48).

During the seventeenth century the strategic importance of the castle waned, with its defences barely maintained amid a period of prevarication and cost-cutting. As an article from an 1894 edition of *British Architect* reads "to be in disrepair seems to have been the fate of Dumbarton Castle in every century, and about 1647 we have its buildings described as ruinous, and its walls in one part stayed up with timber deals" (1894: 105). This accounting does much to trouble the notion of the castle's enduring qualities, standing firm amongst the trials of time and events. Instead, it invites consideration of a place that has been repeatedly resettled, reconstituted and re-tooled; a place of make do-and-mend as opposed to perennial monumentality. Indeed, the repair and preservation of the Rock's extant

fortifications remains an ongoing and expensive responsibility for the Rock's current owneroccupants, the government-funded agency, Historic Environment Scotland.

If the waxings and wanings of military investment in architecture and ordnance make the Rock's story variable, in its general appearance it has changed little over the centuries. An engraving in John Slezer's 1693 *Theatrum Scotiae* provides an image of the Rock, seen from the town of Dumbarton in the late seventeenth century (see Figure 6). It is a vista that remains recognisable today, with the steep, north-west face and boulders clearly reproduced. Accompanying the engraving is text written by Robert Sibbald in which he notes the natural defensive qualities afforded by the Rock and its estuarine surroundings:

The Town is situate in a Plain on the Bank of the River Levin, near the Place where it enters into Clyde, a little below the Castle, which is excellently fortified by Nature, owing little to Art; and seems to have been built by the Ancient Brigantes.²⁸

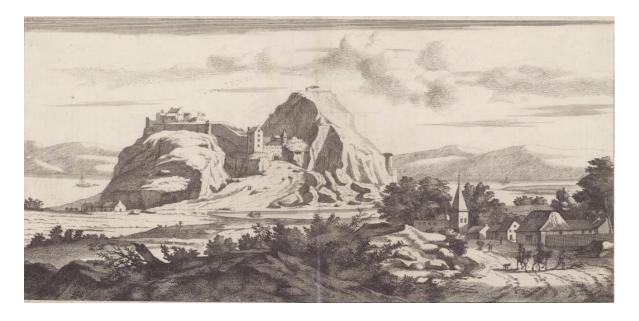


Figure 6: Their Majesties' Castle of Dumbarton from the West, Theatrum Scotiae, John Slezer 1693. The former 'Wallace Tower' can be seen located adjacent to the old north entrance. (Image: National Library of Scotland)

Following the Jacobite uprisings of the eighteenth century the castle was once again deemed "a place of supreme importance" by the government of George II, and its defences were duly upgraded under the supervision of General George Wade. The castle's role as a state prison continued with notable Jacobite leaders imprisoned inside. One was Sir James Campbell of Auchinbreck who maintained that "the air of the place agreed with him, and he much

preferred it to any other" (MacPhail 1975: 150); possibly due to the fact the Rock's lofty position would have allowed a clear view towards the western horizon where his homeland of Argyll lay. With the onset of the French Revolutionary and Napoleonic wars in the nineteenth century new cannon batteries were added to the castle better to ward off any invading fleet, though in truth, the was Rock no longer a site of pressing strategic importance (MacPhail 1975: 154).

Indeed, by this juncture the Rock was emerging as something of a scenic attraction, with a notable visit made by travellers Samuel Johnson and James Boswell in 1773 who wrote of his famous companion "though the approach to the castle is very steep, Dr. Johnson ascended it with alacrity and surveyed all that was to be seen" (MacPhail 1975: 150). In 1803 Dorothy and William Wordsworth made their way to the castle alongside Samuel Taylor Coleridge as part of a wider 'Scottish tour' that was fast becoming fashionable. The Rock's picturesque situation and historical associations warranted its inclusion in such popular travel itineraries of Scotland (MacPhail 1975: 151).

In 1847 the Rock's historical role as the site for a royal castle was recalled by a visit from Queen Victoria during a Scottish tour on her yacht 'The Fairy', with a landing wharf specially constructed for the Monarch's arrival. In Hope James Stewart's depiction of the occasion we see pomp and circumstance on show, as well as the sublime, looming presence of the Rock behind, the overhang of its north-west face slightly exaggerated for visual impact (See Figure 7). In contrast to Stewart's grandiose depiction of the Rock is Queen Victoria's pencil drawing of its south-western aspect, sketched as The Fairy rounded the Rock's base from the waters of the Clyde to the Leven. Despite its simplicity, the lumpen nature of the Rock's south-western flank and its curtain wall are well captured, as is the jumble of large boulders located under the north-western face (see Figure 8). In her diary entry for the day, Queen Victoria observed how "the situation...is very fine, the rock rising straight out of the river, with mountains all round, and the town of Dumbarton behind it. It is very picturesque".²⁹



Figure 7: Landing of Queen Victoria at Dumbarton in 1847, Hope James Stewart (Image: West Dunbartonshire Council)



Figure 8: Queen Victoria's pencil drawing of Dumbarton Rock as seen from the River Clyde (*Image: Royal Collection Trust*)

Ultimately, the appearance of these pioneering early tourists at the castle's walls prefigured the Rock's transition from military base to monument, with its commanding views and impressive geology an obvious draw for seekers of the picturesque. The gradual windingdown of the castle's military operations throughout the nineteenth century concluded in the next, when the War Office formally passed custody of the Rock to the Office of Works on June 29th, 1909. The Office of Works specifically undertook "the charge of the Castle and Rock for the purpose of maintaining this ancient fortress as a place of historic interest" (MacPhail 161: 1979). However, the Rock was called into action once more when an anti-aircraft battery emplacement was mounted on its ramparts during the Second World War to protect the high density of shipyards and industry along Clydeside (see Figure 9). On the night of the 5-6th May 1941, four high explosive bombs landed on the Rock, likely intended for the Blackburn aircraft factory and Denny's shipyard located adjacent to its northern aspect. This German attack was the first on the stronghold since it had fallen to Oliver Cromwell in 1652, and also the last in its 1,500 years of recorded history (Tabraham 2005: 27).

Although what is offered here is a selective and capsular account of Dumbarton Rock's history, it is intended to convey with sufficient depth and detail the episodic nature of the site's human history over 1,500 years; during which the Rock was the subject of successive occupations, ruinations and reimaginings, as military engineers struggled to continually update and adapt an angular site to meet the martial demands of their times. Ultimately, it is this historical narrative of the Rock as an ancient fortress which has defined its official designation as a place of national heritage from the late nineteenth century through to the present day; with the practical focus of its current occupants, Historic Environment Scotland, upon the preservation of its surviving (largely Georgian) military architecture.

Like other occupiers before it, HES is tasked with protecting the rock, though no longer for military ends. Legal protections rather than gun emplacements serve to defend Dumbarton Rock and its historic fortification. The site was declared a Scheduled Ancient Monument of national importance in 1994, under the Ancient Monuments and Archaeological Areas Act 1979. The official language of this scheduling, dated 25th April 1994, demarcates its areal extent:

The monument known as Dumbarton Castle comprises a volcanic plug of basalt on which are the remains of a) a Dark-Age fort, b) a medieval castle, and c) a Georgian garrison. The area to be scheduled is irregular on plan, consisting of the volcanic basalt plug with all its surviving buildings, walls, fences, stairs and paths, and measures 250m E-W by 260m N-S.³⁰

Closer scrutiny of the Rock's boundary area reveals what might be referred to as notable micro-geographies and irregularities of the site. A series of fourteen historical boundary stones (circa 1913) mark the area of 'Crown Property' upon which the Rock's scheduled status rests. Adjacent to the Rock's scheduled area are other landholders, such as West Dunbartonshire Council, Dumbarton Football Club, and The Rock Bowling Club. The hemmed-in nature of the site is not a recent development. The Rock was abutted by various heavy industries during the boom years of industrial Clydeside (see Figure 9).



Figure 9: Dumbarton Rock and surrounding industry, 1979. Note Denny's Shipyard abutting its northern aspect (*Image: Canmore*)

Placed in a broader bureaucratic context, Dumbarton Rock is one of hundreds of scheduled sites to be found across Scotland; a national portfolio reflecting the wider mission of HES to "investigate, care for and promote Scotland's historic environment". Legislative protection afforded to Dumbarton Rock is further reinforced by its status in law as a Site of Special Scientific Interest (SSSI). This classification, issued by Scottish Natural Heritage, is in recognition of "a well-preserved and nationally important example of a volcanic plug of Lower Carboniferous age (around 340 million years ago) composed of hawaiitic basalt". These overlapping designations are testament to the historical, cultural and natural heritage value attributed to Dumbarton Rock, and a desire to preserve on behalf of the nation.

Through its official recognition and legal protection then, the Rock is recruited as a component of Scotland's "authorized heritage discourse", whereby "in identifying 'national heritage', the 'nation' is symbolically and imaginatively constituted as a real entity" (Smith 2006: 48).

In a sense, Historic Environment Scotland is faced with challenges comparable to previous generations of military engineers stationed at the Rock, namely adjusting a difficult site to meet changing needs. To elaborate, not only does the preservation of the castle's surviving material fabric present a timely, costly and continuous task, changing definitions of heritage in policy and practice towards more processual understandings demand that HES is sensitive to the alternative meanings that monuments can have for local communities outwith the conventional heritage narrative (Jones 2016). Broadly, this conceptual shift can be considered as a move away from understanding heritage as signifying a physical artefact or record, towards that of a cultural process, in which heritage is continually (re)created and negotiated, and inflected by the incumbent political and ideological paradigms of a given period (Avramie et al 2000). Due to this conceptual reconfiguring, heritage becomes something more immediately contestable and negotiable, with alternative readings and narratives of place given space to breathe. A telling and instructive instance of this heritage contestation is encapsulated in the rock climbing heritage of Dumbarton Rock - a subaltern community of practice which like clandestine invaders of old, has quietly mustered under the ramparts of Dumbarton Castle since the early 1960s, and latterly come into unexpected conflict with those tasked with its care. To chart the unlikely friction between climbers and civil servants it is necessary to introduce those for whom the face of the Rock has come to matter as a place for physical challenge.

A social history of rock climbing at Dumbarton Rock

Having detailed the historical basis of the Rock's status as a Scheduled Ancient Monument, I now turn to consider the Rock's more recent history as a 'forcing ground' for Scottish rock climbing. As opposed to the 'grand narrative' of the Rock's national history, this "small story" (Lorimer 2003) constitutes a modern, localised history of inhabitation. While at first glance, my detailing of the Rock's social history as a distinct rock climbing practice ground may appear of relevance primarily to insiders of the scene, it provides an important means

of speaking outwards to the broader practices of place-making and memory-work that undergirds the ongoing heritage landscaping of the Rock by its climbing community.

Though the six-decade span of climbing history at Dumbarton Rock is dwarfed by the depth of its geological history, the former is intergenerational and, like the latter, defined by successive waves of activity. Though differing in character, in its choice of style and particularity of practice each climbing generation has been inflected by what has gone before, resulting in a whole that is rich and varied with depth and meaning. As with other recorded histories of a community of practice, the focus of the narrative of change and development tends to fall on key individuals and significant events. At the Rock, a 'first ascent' might reasonably be figured as akin to a notable siege or conflict in the history of the nation or indeed the castle above, whereby the 'who and when' is recorded, remembered and retold. Lists of the dates of first ascents and the ascensionist in question are duly listed in the appendices of guidebooks, ensuring that authorship of a route comes to be known by those who follow in their footholds.

In compiling the social history of the Rock's development into a distinct rock climbing venue, I have drawn upon the written record contained in various related guidebooks (Crocket 1975, Shields 1975, Everett 1994, Prentice 2004, Brown 2010, Watson 2013), documentary sources (such as magazine articles and personal records), and the recollections of key individuals in the Rock's climbing history.

The manner in which I have chosen to present the Rock's climbing history is more conversational in tone than certain academic conventions demand. This is partly necessitated by the chronology of 'who and when' but is also a stylistic choice that I hope captures something of the oral nature of the Rock's climbing history, which often emerges spontaneously 'in-place' as situated knowledge, with people, climbs, events and anecdote interwoven, remembered and retold. This non-linear "social memory" (Jones and Leech 2015: 33), plays an important role in shaping contemporary understandings of the Rock's past as a landscape interwoven with individual biographies, with oral history providing a valuable geographical insight into the accretion of "place memory" at the Rock (Riley and Harvey 2007: 348). As Williams writes: "The landscape takes on a different quality if you are one of those who remember. The scenery is [] never separate from the history of the

place, from the feeling for the lives that have been lived there." (1985: 72 in Jones 2011: 879).

1960s: The Early Years

When I say that this rock is unclimbable, it is certain that this attribute...can be conferred on it only by the project of climbing it, and by a human presence. It is, therefore, freedom which brings into being obstacles to freedom, so that the latter can be set over against it as its bounds (Merleau Ponty, [1962] 2005: 392).

Like the hardy pioneer species that are first to occupy a vacant ecological niche, the earliest climbers at Dumbarton Rock emerged in the early 1960s, establishing the conditions that allowed for the flourishing of a greater climbing culture. At first glance, it is somewhat surprising that it took until the 1960s for climbers to realise the potential of Dumbarton Rock, particularly when one considers its high quality basalt and accessible location, and the fact that rock climbing in Scotland was by this time a well-established leisure practice, with its formalisation beginning in the nineteenth century (Crocket & Richardson 2009: 32). Indeed, even in the late nineteenth century, gentlemen climbers were praising the merits of what is generally considered as the thoroughly modern pursuit of 'bouldering' – a style of climbing that eschews the pursuit of height for maximum athletic difficulty, and one for which Dumbarton Rock is perhaps now most heavily used:

Now it is not my contention that one can practice the art of climbing complete - on a boulder; but I know many who have spent most pleasant hours in the pursuit of this branch of our favourite sport, which affords to the ambitious climber at least as good practice as falls to the golfer who 'putts' a ball along his drawing room carpet.

(T. Fraser S. Campbell in the SMC Journal Vol. 4, No.1 January 1896)

So why then did it take another six decades following this endorsement for climbing at the Rock to emerge, despite its obvious potential? Crocket observes as late as 1975 in his *Western Outcrops* guide that "the neglect of the Rock as a climbing ground is difficult to explain, as it includes some of the best and hardest climbing in this country" (1975: 38). Although the early pioneers were aware of the Rock, in cultural terms, little importance was attached to formally recording climbs on 'lowland outcrops' such as Dumbarton Rock until the 1970s (Prentice 2004: 8), with the business of real climbing to be had in the scenic splendour of the Scottish Highlands. Indeed, in the late nineteenth century, members of the genteel climbing establishment such as the Alpine Club viewed crag and outcrop climbing

as a crudity, dismissing its practitioners as "chimney sweeps and rock gymnasts" (Gilchrist 2012: 1393). Furthermore, despite the location of Dumbarton Rock in the thick of industrial Clydeside and the emergence of the 'working-class mountaineer' due to the economic depression of the 1930s, it appears that the obvious climbing on offer was not enough to attract those men seeking to escape the dole queue and hardships of Glasgow. When considering the accounts of notable 'mountain men' such as Tom Weir and Jock Nimlin, it is apparent that Dumbarton Rock would not have provided the sense of escape from the city that they so desperately desired. Although highly motivated and capable climbers, it was the prospect of freedom and adventure that drove them to travel further afield to the mountains of Arrochar, Loch Lomond and to what they considered the "greater ranges" of Skye (Maclean 1980: 81).

As well as these cultural preferences, there were more practical and technical reasons behind Dumbarton Rock's relatively late flowering as a climbing venue. In effect, it wasn't until the 1960s that the proficiency of rock climbers in Scotland (and the available footwear technology) was sufficient to breach the geological defences of the Rock's technically demanding, friction-poor basalt. Aided by the arrival of improved climbing shoes from Europe, it was two talented climbers aged in their early twenties, Brian Shields and Neil MacNiven, who rejected tradition and took the conceptual leap forward to make the first serious forays onto the *tabula rasa* of the Rock's intimidating basalt faces in the early 1960s.

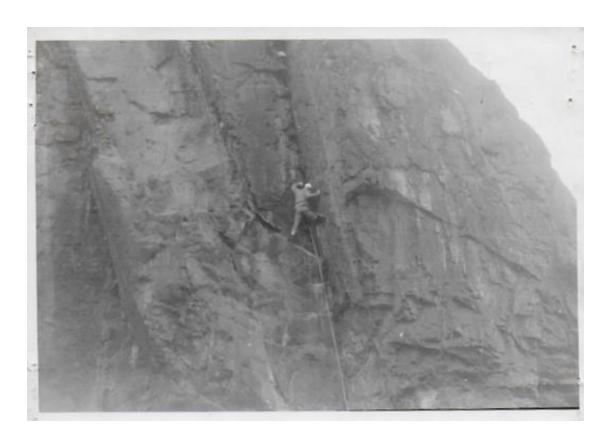


Figure 10: Brian Shields 'free-climbing' Windjammer Crack, 1963 (Image: Shields personal collection)

With the Rock entirely unclimbed (notwithstanding Crawford's scaling of The Beak in 1571), Shields and MacNiven had the pick of the lines, focusing efforts on its most obvious and aesthetically pleasing cracks. Many of the 'easier' routes (though cutting-edge at the time) were climbed 'free'; technically speaking this is climbing undertaken only with the hands, feet and body, and the security of a rope, harness and protection in case of a fall. This form of climbing is not to be confused with 'free-soloing' where the safety of ropes is eschewed completely. In this manner Shields and MacNiven established what today are considered the 'classic' routes of Windjammer Crack and Stonefall Chimney (see Figure 10). Fifty-five years later each is treated as a rite of passage for any aspiring Dumbarton novitiate, a testament to the avant-garde climbing abilities of Shields and MacNiven. As well as freeclimbing, Shields and MacNiven deployed 'aid-climbing' techniques – the hammering of pitons and wedges into suitable flaws in the rock to allow upward progress – on climbs which were beyond their physical prowess to climb 'free'. By these more artificial means they ascended two of the most prominent crack lines on the Rock's north-west face to establish Chemin de Fer and Requiem, climbs that were to figure prominently in the imaginaries of subsequent generations, and to which I shall return (See Figure 11).



Figure 11: Neil MacNiven utilising aid-climbing techniques on the first ascent of Chemin de Fer, 1963 (*Image: Shields personal collection*)

As evidenced by, and illustrated in, Shields' handwritten 1964 guide, the climbing 'subdiscipline' of bouldering was also practiced at the Rock throughout these formative years. His guide contains over 50 'problems', with accompanying topographical diagrams (known in climber's shorthand as "topos") delineating the technical specifics of individual boulder problems and routes. This early insight scrambles the popularly held notion of bouldering as a modern practice; one largely credited to John Gill, American gymnast and mathematician, who did much to legitimate the practice worldwide as an independent activity in the 1950s and 60s, via his application of gymnastic sensibilities to rock climbing (Watson 2007: 25). Whether Shields and MacNiven were aware of Gill or not is unknown. What is evident is that the Rock was utilised as a bouldering practice ground during the formative years of its 'global' development into a coherent climbing discipline.

It is also interesting to note that the Rock's reputation for danger and seriousness was apparent from the start. In a letter from the prominent post-war climber Jimmy Marshall to Brian Shields, in which he relates the details of one of his recent first-ascents in Glen Etive, Marshall writes "would think this is very small potatoes compared to Dumbarton Rock and its very frightening looking problems!". The pioneering partnership of Shields and MacNiven was brought to a tragic end in 1964 after MacNiven was killed by rockfall in the Alps at the age of 21. Despite the loss of his climbing partner and friend, Shields continued to establish new routes at the Rock with Michael Connolly and others, remaining active on its basalt until approximately 1975. After a lifetime of measured risk-taking, Shields was sadly killed in Spain in 2011 at the age of 67 after being involved in a car accident.

1970s: The 'Dumbarton Boys'

Quietly mustering below the castle ramparts a distinct community of practice slowly and steadily coalesced, informed and inflected by the exploratory mapping of Shields and MacNiven. In the 1970s a new crop of 'Dumbarton Boys' emerged, including Rab Carrington, John Jackson and the unashamedly gallus pairing of 'Big' Ian Nicolson and 'Wee' Ian Fulton, each seeking to leave their own mark on the Rock's still formative climbing landscape. Bringing a distinctive Glasgwegian swagger to life on the Rock, alongside a clutch of bold new routes, they established newer and harder boulder problems. Many took weeks to work out. Emboldened by the greater technical performance of EB 'Super Gratton' climbing shoes, the second half of the decade saw bouldering standards further improve as climbers sought to test the limits of frictional adherence and kinaesthetic abilities (see Figure 12). In 1978 the first problems to breach the technical grade of 'British 6a' duly appeared at the Rock, with Willie Todd establishing *Good Nicks* and Mark Worsley climbing the overhanging crack of Supinator (see Appendix 1 for an explanatory table of climbing grades). In the same year Pete Greenwell pushed further again, deploying deft footwork, power, and dynamism to establish the Rock's first 'British 6b'. Gorilla took its name from the ape-like 'swing' required to complete the ascent.

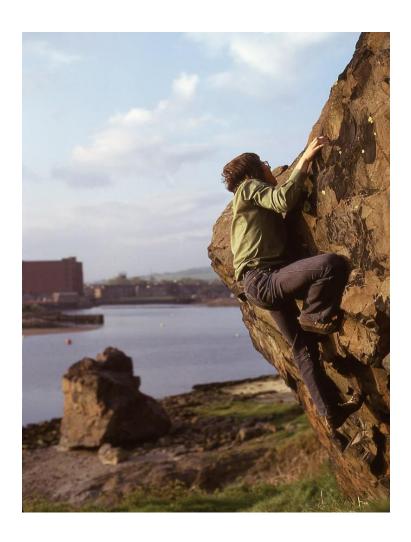


Figure 12: Steve Belk climbing the boulder problem *Narcosis* with a pair of EB Super Gratton climbing shoes, 1970s (*Image: Ken Crocket personal collection*)

The late 1970s also witnessed a stylistic turn away from the aid-climbing techniques of the previous decade, and towards the greater physical challenges of free-climbing. This trend was embodied on the walls of the Rock, when in 1978, Steve Belk made the first entirely 'free' ascent of *Longbow*, a route first climbed by Shields in 1964 partly by artificial technique. As well as heralding an overall improvement in climbing standards, the 'freeing' of old aid routes was a cultural renaissance of sorts, whereby climbing a previously aidedroute, 'free', was perceived as a better and purer style, amounting to a 'new' first ascent or 'first free ascent' (ffa). Although an outcome of etymological incidence rather than intent, the 'freeing' of a route also had connotations of a route being released from the artifices of aid-climbing; with its truer poetry expressed in the unmediated contact between climber and rock and the sequence of movements required to scale it.

1980s: A New Wave

Like the hard graft renowned in industrial surroundings, the Rock proved to be a forcing ground for Scottish rock climbing, with the 'freeing' of the remaining major aid lines of the 1960s and 1970s providing the main focus for the 1980s 'new wave'. The main protagonists during this decade were remembered for their sinewy figures and spritely nature: Dave 'Cubby' Cuthbertson and Gary Latter. In the spring of 1980 Cuthbertson freed one of the main crack lines up the Rock's north-west face, *Chemin de Fer* at the grade of E5 6a. First aid-climbed by Shields and MacNiven in June 1963 over six hours, utilising 17 pegs and a wedge (see Figure 11), Cuthbertson's first free ascent 17 years later represented a great leap forward. Cuthbertson also displayed his climbing prowess on the boulders, adding the powerful and athletic *Mugsy (Ya Bas)*, the Rock's first British 6c and no doubt useful practice for the hard moves required to free the aid routes looming above. Meanwhile, Gary Latter added the classic and varied boulder problems of *Mestizo*, *Toto*, *Physical Graffiti* and *Pongo*. These routes continue to be considered "must-dos" for any aspiring boulderer at Dumbarton, requiring power, precision and belief in equal measure.

In 1983, Gary Latter climbed the bold, rising traverse of Rock of Ages and liberated The Big Zipper (first aided by Shields in 1964) of its two remaining aid bolts, taking six day's work across the summer. During the same period, Cuthbertson was engaged in a long, protracted battle with *Requiem*, the biggest and best un-freed line of them all, cutting a spectacular line straight up the centre of the Rock's intimidating north-west face. After six weeks of sustained effort in humid conditions, Cuthbertson finally latched the final dynamic move to gain the top of the headwall, and in doing so, established one of the hardest rock climbs in the UK at the time; at E7 7a (now E8 6c) – with an equivalent sport grade of around 8a+. Originally aid-climbed by Brian Shields and Michael Connolly in December 1964, Cuthbertson's first free-ascent almost 20 years later provides one of the most iconic events in the Rock's climbing (and folk) history; effectively putting 'Dumby' on the map of the UK's climbing cognoscenti (See Figure 13). Some thirty-five years later, a successful ascent of Requiem remains a sought-after prize and significant challenge for expert climbers. A visiting professional French climber, Caroline Ciavaldini established the first female ascent of Requiem in September 2014, leading her to reflect on its historical importance: "I found out recently it's the first E8 of the country – that's another thing I like with trad climbing is all the history part. Requiem has a history, and to know that it's been climbed in eighty-something – it's just unbelievable I find". 34

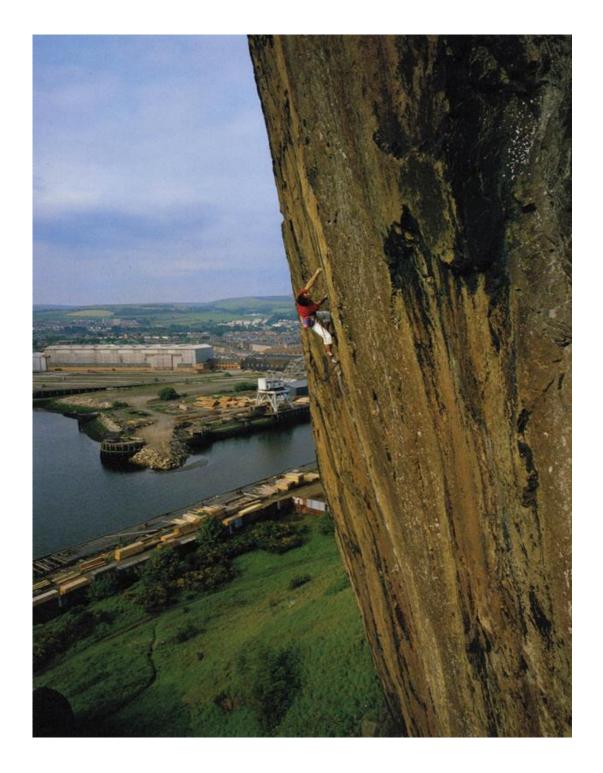


Figure 13: Dave 'Cubby' Cuthbertson on the first free ascent of Requiem (Image: David Jones)

1990s: Bouldering and Bolts

Just as the 1980s at the Rock was defined by the freeing of previously aided routes by Cuthbertson and Latter, the 1990s saw the Rock's modern bouldering scene come of age alongside the emergence of its first 'sport' climbs. The figurehead in this period was a Glaswegian panel beater named Andy Gallagher (see Figure 14). Between 1990 and 1994 Gallagher utilised his powerful physique and dynamic style to 'fill-in' many of the obvious gaps on the boulders that were beyond the ability (or technical conceptualisation) of previous generations. As well as the short, powerful problems of *Slap Happy* and *Headbutt*, Gallagher established a new strain of sustained, stamina problems such as Consolidated and 1990 Traverse. As opposed to climbing directly up a boulder, the purpose here lay on climbing horizontally (or on a rising traverse) across the rock face to include as many moves as possible in one problem. This targeted focus on climbing stamina reflected the concomitant development of sport climbing at the Rock, which required new levels of power and endurance. Developed largely on the limestone crags of continental Europe, sport climbing involves the drilling of bolts into the rock face which allows climbing to take place on terrain which would be otherwise 'unprotectable' by traditional means. The relative safety of this 'in-situ' protection enables climbers to push their physical capabilities without fear of injury.

Adding a new kind of industry to a rapidly declining Clydeside, Andy Gallagher was at the forefront of the sporting development of the Rock, alongside Cameron Phair (pioneer of *Half Breed* 7b 1993), Mark McGowan (*Tarrier* 8a 1993) and Benny McLaughlan (*Appliance of Violence* 7b+ 1993), drilling and bolting the blank walls between the traditional routes to create modern 'test-pieces'. Gallagher bolted and climbed most of the now classic sport lines such as *Persistence of Vision* (7a+ 1997), *Unforgiven* (7b 1993) and the soaring, ship's prow arête of *Omerta* (7c 1993). The technical leaning wall right of the Rock's north-west face yielded some of the best sport routes, with the fine trio of *Dum Dum Boys* (8a 1995), *Sufferance* (8a 1993) and Mark McGowan's *Tarrier* (8a 1993), as well as several subsequent link-ups and variations.

In a broader context, the initial emergence of sport climbing and the bolting of routes in the UK presented something of an uneasy culture change, with some climbers seeing it as a threat to the 'traditional' climbing ethic, going as far as 'chopping' bolts from rock faces. At the Rock, bolts were considered as a rational way of opening up its otherwise blank faces,

with new sport routes co-existing alongside established traditional routes. However, the first appearance of bolts in the 1990s did provoke the ire of Historic Scotland, which deemed drilling into the Rock as a defacing of an Ancient Scheduled Monument, duly removing the bolts and seeking to enforce a ban on climbing at the Rock. Coverage appearing in the *Observer*, 31st March 1991, detailed the controversy. Entitled "*Power-drill climbers accused of vandalism: mountaineering's image on slide after row over bolts in historic castle cliff*", the article describes the controversy caused in climbing circles over the increasing adoption of sport climbing techniques and the souring of relations with the Rock's official guardian organisation:

A spokesman for Historic Buildings and Monuments said: These bolts were placed on the rock without any consultation with the owners or the Scottish Nature Conservancy Council, who have registered the rock as a Site of Special Scientific Interest. We do not want our rock damaged and therefore we arranged to have the bolts removed (Beaumont 1991).

The irony that the removal of sport climbing bolts at the Rock required contracted steeplejacks to drill further bolts, evidences the fact that damage to the Rock was dependent on whose actions were under question at any given time. Though this cultural misunderstanding was subsequently resolved through a consultation process involving the Mountaineering Council of Scotland, it illustrates a gulf in understanding that existed between professional and practising communities, and an official perception at the time that climbing at the Rock was not in keeping with its status as a historic monument.

Despite the controversy over the use of technology in sport climbing, the profile of the Rock as a hard bouldering venue continued to develop. In 1994, a young climber named Malcolm Smith, travelled west from his home in Dunbar and established *The Shield*, the first British 7a at The Rock, and another route *BNI Direct* at the same grade. 'Dumby' was the perfect testing ground for Smith's 'new-school' approach, based on indoor-honed power and total dedication to training. What it lacked in conventional scenic aesthetics was more than made up for by the sheer quality and desperate nature of its unclimbed lines. In 1998 Smith turned up and climbed the sit start to the *Pongo* crack in a day, climbing its full length with long, powerful lock-off moves to establish the Rock's first Font 8a. Smith's ascent of *Pongo Sit Start* brought the Rock into line with the continental standards of the time, continuing its role as the engine room of hard Scottish rock climbing.



Figure 14: Andy Gallagher climbing the 'highball' boulder problem of *Royal Arete*, 1990s. Note the industrial complex of Ballantine's Whisky Grain Distillery across the River Leven, now demolished (*Image: Guy Robertson*)

2000s: Dumby Dave

Just as Smith was setting new standards, Dave MacLeod, a young pony-tailed climber became a notable presence at Dumbarton. Uninterested in the passive and didactic classroom education on offer at high school (MacLeod 2005), MacLeod utilised The Rock for a different kind of learning that would propel him to the highest levels of climbing ability and achievement. Over a ten-year period between 1996 and 2006, MacLeod systematically assessed the hardest projects left on offer at the Rock, completing them one by one through a tenaciously dedicated approach. Relocating himself to Dumbarton to be closer to his projects, "Dumby Dave" became a talismanic presence at the Rock, as if an embodied extension of the basalt itself.

In 1996, fresh from an apprenticeship on the Dumbarton boulders, a 17-year-old MacLeod showed obvious talent by repeating many of Andy Gallagher's classic test-pieces such as Dum Dum Boys, Consolidated and the bold Trick of the Vale. In the following years, MacLeod went on to repeat all the existing problems at the Rock including Smith's coveted Pongo Sit Start in 1998. After exhausting the Rock's established boulder problems, MacLeod began to seek out his own challenges. In 2001 he took a direct line up the Gorilla arête to produce the burly and aptly named Silverback (Font 7c). The following year, MacLeod extended Silverback further to finish up Gorilla Warfare (Font 7a+), establishing King Kong (Font 8a) in the process. MacLeod's respectful nod to the original line of Gorilla is clearly evidenced in his playful variations on its name, providing an example of the generational layering which characterises the Rock's climbing history. Route naming conventions noted, MacLeod continued to push the grades further on the steep overhang of the B.N.I (Bloody Nigh Impossible) boulder with Sabotage in 2003 (the Rock's first Font 8a+), which was soon followed by Scotland's first Font 8b, The Perfect Crime (now 'downgraded' to Font 8a and Font 8a+ respectively). Perhaps the prime example of MacLeod's attritional approach however was his ascent of *Pressure* (Font 8b) in 2005, taking a line through the desperate, horizontal terrain of the black cave of the Eagle Boulder - the culmination of a sustained siege of approximately one hundred days of effort over four years (see Figure 15).

Having set these 'world-class' standards, MacLeod went on to add a clutch of other futuristic and weighty problems such as *Sanction* (Font 8b), *Chahala Sit Start* (Font 8a+) and the long

roof problem of *Sosho* (Font 8a+). As well as these headline acts, MacLeod also established an array of 'easier' problems during his extended tenancy at the Rock, many of which have seen little or no repeats ascents due to their often technical and committing nature. MacLeod wasn't alone in mining the Rock's hard bouldering potential however, with Malcolm Smith keeping pace into the new millennium. As well as swift repeats of MacLeod's matrix of test-pieces, Smith forged his own brand of intensely physical bouldering on the Rock, establishing sustained link-ups such as *Supersize Me* (Font 8b, 2005), *Serum of Sisyphus* (Font 8a+, 2006), *Gutbuster* (Font 8b+, 2009), *Firefight* (Font 8b, 2010) and *Grande Tour* (Font 8b, 2010). The establishing of numerous boulder problems at these world-class levels of difficulty continued to cement the reputation of 'Dumby' as *the* forcing ground of hard Scottish rock climbing; the site boasting one of the highest concentrations of elite boulder problems than any other venue in the UK.

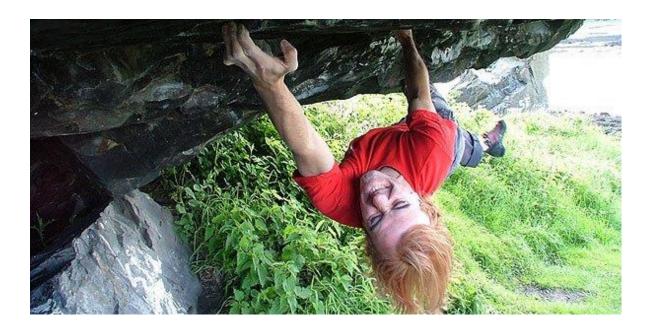


Figure 15: 'Dumby' Dave MacLeod 'working the moves' on Pressure, 2005 (Image: John Watson)

The attainment of such high levels of achievement in bouldering often requires specialisation, whereby a climber's training activities and goals are focused upon the one 'discipline' at the necessary sacrifice of others (a channelling of effort akin to the separate specialisms of a 100m sprinter and an 800m runner). However, as MacLeod's honour roll at Dumbarton proves, there are rare exceptions to the rule, with his bouldering achievements going hand-in-hand with a series of ground-breaking sport and trad first ascents. In 2003, he added *Tolerance*, the Rock's first 8b sport route via a link up of *Tarrier*, *Sufferance* and *Dum Dum Boys*, and in 2004 added the short power route of *Negative Creep* (8b) - a name inspired by his love of the iconic 90s 'grunge' band Nirvana (as with his boulder problem *In Bloom*).

Within MacLeod's Dumbarton first-ascents, it is his extensions of the two central crack-lines at the Rock that remain most prominent in the recent cultural memory of the Rock's climbing community. Having been freed by Cuthbertson in 1980, MacLeod sought a new challenge by establishing a direct finish to *Chemin de Fer*, diverting from the crack where it veers left, to take a new line straight up the seemingly blank headwall above. This greatly increased the technical difficulty of the route as well as its seriousness, necessitating extremely strenuous climbing on the headwall while several feet above the last available gear placement. The end result (after eleven long falls from the desperately smooth headwall) was *Achemine* (E9 6c), Scotland's first of the grade. At an equivalent sport grade of F8b above a significant 'runout', it is little surprise that to date *Achemine* has seen only one repeat, from visiting Austrian climber Barbara Zangerl in 2016.³⁵

Drawing upon the same ethos that inspired *Achemine*, in 2004 MacLeod sought out the line of greatest resistance on the crown of the headwall above the *Requiem* crack – a slightly indirect line which vaguely resembles an inverted question mark (¿). After a protracted and intense struggle, including numerous 60 to 70-foot falls from the final moves, on the 9th April 2006 MacLeod established *Rhapsody*, at the unprecedented grade of E11 7a. His effort amounting to seventy days over a two-year period. Hailed in the climbing media as "the world's hardest traditional climb", ³⁶ *Rhapsody* brought MacLeod, and by association 'Dumby', to the notice of the world's climbing elite, helped in large part by the niche documentary 'E11' (produced by *Hot Aches*) which showed MacLeod's painful struggles and eventual success on the route. ³⁷ Drawn to the world-class challenge that *Rhapsody* offered, a second ascent by the visiting Canadian climber Sonnie Trotter took place in June 2008, after a month of preparatory effort, eagerly followed by climbers worldwide via

Trotter's online blog (see Figure 16).³⁸ The route has since been 'repeated' three more times, by the high-profile climbers Steve McLure (2008), James Pearson (2014) and Jacopo Larcher (2016).

As MacLeod's crowning achievement at the Rock, *Rhapsody* provided a natural stepping off point for his pursuit of new climbing challenges elsewhere. In 2007, he relocated to the Scottish Highlands to be closer to a whole new series of hard projects, with his decade-long tenure as 'Dumby Dave' drawing to a close. Despite the end of such a singular and productive association between person and place, MacLeod's ethos of dedication, tenacity and technical ability shaped on Dumbarton Rock's dark basalt has shaped his unrelenting approach to hard rock climbing, both at home and abroad. In a blog posting from 2007, MacLeod offers some interesting reflections on the generational climbing history of the Rock and its wider social value:

I am jealous of the future teenage Glaswegian climbers who discover the rock and get hooked – they have a good challenge these days to repeat the progression in grades that all the previous generations did. When I started, 'Consolidated' was the hardest problem and now we do laps for the warm-up. They will have to do the same on Sanction! Cool. Most young climbers set their sights on or within the present limit of the day. But some look higher from the outset, and decide to make it happen. Andy Gallagher, Cubby and Malcolm Smith all did that. I'll be well psyched to see the next person who takes it on...

Sometime I'd also love to see everyone who lives in Dumbarton (if not Scotland) know about the value of the cliff and boulders there. The castle on top of the volcano is Dumbarton's wee claim tae fame. But that will always be something that was only important in the past – the climbing is important in the past, present and future, which is much more valuable.³⁹

Although the pioneering of new routes at the Rock has inevitably slowed down after sixty years at the cutting-edge, the site continues to serve as a classic proving ground for new generations of climbers testing their mettle, engendering fresh scenes and cooperative passions. Indeed, even in the post-MacLeod years, new routes and problems continue to be established, often by the imaginative 'linking-up' of existing climbs. Despite the indoorhoned power of many of the new 'young team', the challenge offered by the Rock's plethora of hard climbing remains a considerable and popular challenge, with its unforgiving and demanding basalt a far cry from the brightly coloured security of indoor climbing holds. Thankfully though, a characterful, vigorous and gregarious community of climbers orbits the Rock, with old hands happy to dispense advice to the uninitiated or less experienced.



Figure 16: Canadian climber Sonnie Trotter taking one of twenty-four lead falls from the headwall of Dave MacLeod's *Rhapsody*, prior to his eventual success in June 2008 (*Image: Cory Richards*)

Heritage landscaping at Dumbarton Rock

Having provided a narrative of the Rock's historical development as a climbing venue since the early-1960s, broadly structured via generational waves of activity and changing sociotechnical practices, I will now examine the manner by which the Rock's climbing landscape 'operates', through two differing but related conceptual lenses. Firstly, I will consider the Rock's climbing landscape as a 'text'. That is, one that has been socially inscribed upon the Rock via the naming, grading, description and representation of first ascents in guidebooks. From this textual perspective, the Rock's associated climbing guidebooks can be read as historical records of its "conversion of space into place", which have been pivotal in the representation, dissemination and fixing of its contemporary climbing landscape and its ongoing spatial reproduction (Nettlefold and Stratford 1999: 137).

To complement this landscape-as-text approach and in keeping with the more recent performative turn in geographic scholarship, in Part II of the chapter, I examine the Rock's climbing landscape as one that is also profoundly phenomenological. In effect, the performative turn rendered landscape "from a distant object or spectacle to be visually surveyed to an up-close, intimate and proximate material milieu of engagement and practice" (Wylie 2007: 167). Due to this corporeal focus, performative notions of landscape are highly applicable to the embodied landscape of the Rock, accounting for the ongoing, individual engagements that compose its "more-than-representational" aspects (Lorimer 2005). In other words, we must go beyond the Rock's representation in guidebooks to attend to the multifaceted nature of its climbing landscape. Despite the differing genus of these two modes of landscape inquiry however, I will not situate them as "binary epistemological opposites" that require an 'either-or' decision (Lorimer and Lund 2003: 142), but instead I will consider the means by which Dumbarton Rock's representational and embodied climbing landscapes are co-produced; illustrating the fundamental "complementarity of landscape-body and landscape-as-text perspectives in the social production of space" (Rickly 2017: 69).

As well as the more-than-representational facets of the Rock's climbing landscape, we must also consider its more-than-human aspects. To do so, I utilise work that considers climbing as a "technologically mediated embodied practice", recognising the fact that the climbing body is enabled and co-constituted via specific climbing tools and technology (Barratt 2011). I consider the manner in which improving technology has directly inflected socio-technical

practices at the Rock and the production of its climbing spaces. Finally, I consider the provenance of the Rock *itself* in the emergence of its associated climbing culture. As opposed to existing as an inert backdrop upon which cultural values have been inscribed, we must be attentive to its own material agencies (Ash and Simpson 2014). Though it may appear that landscape is the primary concern thus far; with the recognition that "practice and experience provide the locus for the creation of meaning in relation to the historic environment" (Jones and Leech 2015: 34), heritage is also drawn into the conversation. Understood as a form of place-based heritage landscaping, we can consider the means by which the Rock's performative climbing landscape generates alternative heritage (or social) values, outwith its official designation as a Scheduled Ancient Monument (Jones 2016).

The climbing landscape-as-text

As detailed in the previous section, we can consider Dumbarton Rock's climbing history as a sequence of inter-generational succession. Recorded in numerous guidebooks across the decades, each generation has been influenced by those preceding it, while also forging change through shifting cultural and socio-technical practices. With the passing of decades since the pioneering days of Shields and MacNiven, a layered climbing culture has steadily accumulated, with the "sad neglect" of the Rock noted by Shields in his early guidebook replaced by decades of deep mapping and dwelling. As the 1994 and 2004 editions of Lowland Outcrops show, we see the full flourishing of 'Dumby' into a renowned, revered and 'feared' climbing venue:

Glasgow's best outdoor training and bouldering area has a climber loyalty that dwarfs other crags in this guide. But for as many that love the seriousness and technicality of the many boulder problems, there are lots of climbers whose blood runs cold at their mere mention. Dumbarton isn't a crag for the weak-fingered or the weak-hearted, but perseverance will strengthen both (Everett 1994: 25).

One of Scotland's finest low lying outcrops. Combining excellent bouldering on the huge basalt boulders with spectacular positions on the main North-West Face, it offers varied and exhilarating climbing...On a summer evening the crag is a sun trap and is often buzzing with climbers. Climbers will also be found in the depths of winter due to Dumbarton's quick drying and accessible nature. Dumbarton Rock is arguably Scotland's finest and most intense bouldering venue, ranking among the best in the UK...'Dumby' has always retained a reputation for danger and seriousness (Prentice 2004: 103).

From the perspective of 55 years of subsequent climbing practice at the Rock, it is remarkable to consider its now storied or "hyperinscribed" faces as once blank and

unmapped (Gilchrist 2012: 1399), as well as the pioneering spirit and self-belief of Shields and MacNiven in exploring a then uncharted climbing terrain. The publication of Shields' and MacNiven's initial wave of development at the Rock in the Scottish Mountaineering Club Journal of 1965 laid down the primary conditions from which successive generations of Dumbarton climbers would operate, via a series of subsequent guidebooks. In many of these guidebooks, such as *The Southern Highlands* (Bennet 1972), *The Glasgow Outcrops* (Highrange 1975), *The Western Outcrops* (Crocket 1975) and *Lowland Outcrops* (SMC 1994, 2004) the Rock is featured as one among many crags, while more recent guides such as *Dumbarton Rock* (Brown 2010) and *Dumby Bloc* (Watson 2013) are dedicated entirely to the Rock.

As Heywood describes, guidebooks are integral to the practice of rock climbing, effectively setting the spatial parameters by which climbers interact with a given landscape:

...a current guidebook is almost as important as a rope . . . guidebooks contain enormous amounts of information, much of it in a codified, convention-governed form; with these descriptions the competent interpreter approaches the climb with a considerable amount of reliable, intersubjectively verified knowledge. Unpredictability is significantly reduced, while the climber's ability to objectify and control the climbing environment increases (Heywood 1994: 186).

The information provided in guidebooks is communicated in a highly visual and textualised manner. Most guidebooks have an introductory history section detailing the development of the climbing area in question. This history is generally structured by era and distinct waves of activity, with the main protagonists and their first ascents described. The spatial information of guidebooks is communicated through a combination of maps, photographs and 'topos'. Topos are vertical representations of rock faces (usually photographs) with the lines of individual routes traced upon them, delineating the rock face into a series of named and graded routes (See Figure 17).

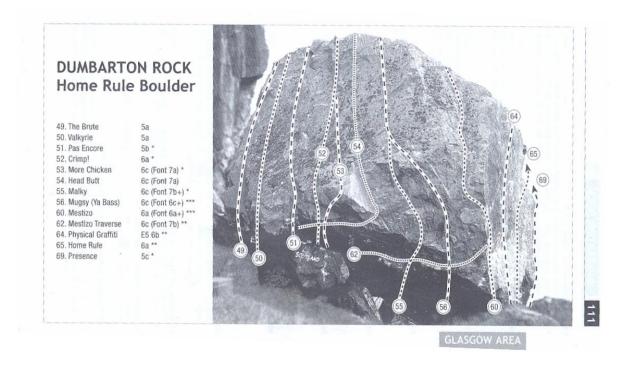


Figure 17: 'Topo' of the Home Rule Boulder and its boulder problems in the 2004 edition of *Lowland Outcrops* (*Image: SMC*)

Accompanying each route is a short verbal description that communicates its key features and character and occasionally some historical context. A series of symbols communicate additional information about a route, such as its 'quality' (number of stars or asterisks), as well as colour coding to delineate routes according to climbing style (aid, traditional, sport, bouldering). This provides the climber with quick and easy visual aids in locating their desired style and difficulty, with 'starred' climbs generally the most popular.

Nettlefold and Stratford (1999) suggest this codification of climbing landscapes as a process of textualisation, allowing the rock to be read and understood by an associated textual community (i.e. rock climbers versed in the jargon and symbolism of the sport). They posit first ascents (the naming, grading and description of individual routes) as the key means by which such climbing landscapes are textually constructed; transforming seemingly homogenous rock into quantifiable objects, in an enfolding of individual "biography formation" and the "social construction of place" via language (see Figure 17). In this manner, routes become equated with individuals, as at Dumbarton Rock: *Windjammer Crack* – Shields, *Chemin de Fer* – MacNiven, *Requiem* – Cuthbertson, *Physical Graffiti* – Latter, *Slap Happy* – Gallagher, *Pongo* – Smith, *Rhapsody* – MacLeod. As Nettlefold and Stratford

state: "traces of the climber's actions are therefore incorporated into representations of the place where these actions were performed: naming first ascents humanises the environment" (1999: 138).

A key feature in the textualisation of climbing landscapes is the quantitative dimension of climbing grades, which as well as providing "an ideal measure for comparisons of performance and skill between climbers" (Nettlefold & Stratford 1999: 136), influences where individual climbing performances take place more than any other aspect of the climbing landscape-as-text. Indeed, climbers will generally choose a climbing venue in relation to the number of climbs available within their grade range and chosen style, with grading also directing their route choices once at the venue. Venues that offer no climbing within their perceived grade tend to be avoided altogether. This quantification of the climbing landscapes thus produces "a conceived space of climbing which suggest that particular climbing bodies, climbing abilities, and socio-technical practices are appropriate for the performance of this spatial practice" (Rickly 2017: 81). Such an outcome is apparent at the Rock, which as shown by the guidebook introductions quoted above has an enduring reputation as a 'hardcore' climbing venue, with few climbs suitable for beginners or the less experienced. As such, those who visit the Rock tend to occupy the more experienced end of the broad spectrum of individual climbing ability.

In the translation of homogenous rock into codified representations of climbing spaces, guidebooks exert a significant influence upon user-readers. The validity of Nettlefold and Stratford's landscape-as-text analogy, is illustrated by the fact that for a first-time visitor to the Rock, a guidebook (or a local with the requisite knowledge) is a useful accompaniment, delineating basalt into named and graded routes via topographical diagrams and written descriptions. In this manner, the uninitiated are literally 'guided' around the landscape, allowing them to find routes that are safely within their climbing abilities. This imparting of pre-knowledge prior to the act of climbing itself is particularly valuable at the Rock, due to its poor surface-friction and 'hard to read' basalt, as well as the committing nature of many of its routes and boulder problems (see Figure 18).

The terrifying highball slabby grooves right of *Royal Aréte*. Pull on to jugs then tiptoe up direct to a nervy escape-step left near the top to good holds. Finishing directly over the bulge is even scarier, give yourself a brave pill.

Figure 18: Description of the 'highball' boulder problem of The Whip in Dumby Bloc (Watson 2013)

The influence of the guidebook and its associated textual landscape in providing a spatial framework for climbing practice is also evidenced by the fact that a completed climb is often referred to as one that has been 'ticked'. This refers to the practice of placing a tick in the guidebook next to a climb, with many providing a tick-box just for that purpose. In this manner, climbers record their own biographical progress through the pre-inscribed landscape, with ticks often annotated with a date of ascent and climbing partner (see Figure 19).



Figure 19: Excerpt from Gary Latter's copy of *The Glasgow Outcrops* illustrating the practice of ticking climbs. Latter has also annotated the guide with dates of ascent as well as a personal take on the difficulty of each climb (*Image: Gary Latter*)

Though online 'logbooks' provided by climbing websites such as UKC (UK Climbing) have largely replaced the literal ticking of guidebooks, ⁴⁰ the biographical trajectory of completion and collection remains the same. Parallels here can be drawn to the pursuit of 'Munro bagging', whereby the quantification, or "factualisation", of Scotland's 282 mountain summits above 3000 feet, provides "a classificatory system around which everyday leisure practice can be organized" (Lorimer & Lund 2003: 134); just as the Munro bagger 'collects' summits, the climber collects routes, as well as grades.

Nettlefold and Stratford's textual analogy is thus a useful means of understanding the influence of climbing guidebooks upon the social construction of climbing landscapes, as well as their role in fixing and perpetuating distinct and situated climbing cultures:

...with their meaning thus (potentially) preserved, and as textualised representations of the physical environment, climbing routes and climbing landscapes can provide a level of temporal, spatial and symbolic permanence and security for individual climbers, and for climbing culture in general (1999:139).

In this sense then, we can consider the many guidebooks to Dumbarton Rock published over the years as cultural objects which have steered and inflected climbing practice 'on the ground', but also as historical texts that contain a spatial record of the layered development and 'fixing' of the Rock as a climbing landscape, via first ascents. Or, in other words, the recording of "rockclimbers' conversion of 'space into place'" (Nettlefold & Stratford 1999: 137).

The 'Winfield guide'

With regards to the Rock, hitherto unseen primary material uncovered during the course of my research offers compelling insights into the formative period marking its conversion from space into place, through cultural abstraction, quantification and textualisation. The 'historical' document in question is Brian Shields' original handwritten guidebook to the Rock, compiled circa 1964 in a 'Winfield' notebook, complete with hand-drawn topos and photographs. It is stated in the Scottish Mountaineering Club's 1972 *The Southern Highlands Guide* (Bennet 1972: 204) that the section on Dumbarton Rock (which represents its first appearance in guidebook form), was compiled from the notes of Brian Shields, first published in the SMC journal of 1965. It is my assumption that the notes referred to by Bennet are drawn from Shields' personal 'Winfield guide'.

The Winfield guide is in the possession of the Shields family and was obtained through my correspondence with Shields' son, Jon, who provided high resolution scans of its 57 pages. During this correspondence, Jon wrote of his father Brian, "Dad was always very keen to let others know about Dumbarton Rock, so I would have no issue sharing the information I send through, I know it would have pleased him greatly...he had a joy and an ease of movement that never really left him and a casual indifference to dangerous situations". ⁴¹ Due to the primary role of the guidebook in climbing practice discussed above, we can consider the Winfield guide as a cultural and historical artefact, representative of the pioneering activities of Shields, MacNiven and their climbing cohort committed to the early mapping of the Rock's climbing landscape; a period of 'vertical groundwork' laying the foundations for the Rock's subsequent communities of practice to build upon. Shields' Winfield guide sits within the broader emergence of the climbing guidebook in the 1960s as increasingly central to climbing practice. As Taylor states, "In the 1960s guidebooks evolved into quasi-official chronicles that celebrated pioneer climbers, major routes, and key formations. Some guidebooks created a powerful sense of place" - as such, climbing guidebooks can be considered as "invaluable resources for examining how modern recreation has inscribed values onto public landscapes" (2006: 190-191).

Entitled by Shields as *A Guide to the Boulder Problems of Dumbarton Rock*, the Winfield guide provides details of approximately 50 boulder problems at the Rock, as well as over 20 routes on its cliff faces, across 57 pages. In his preface to the guide, Shields (1964) notes the quality of the Rock as a training ground, and the smooth, quick-drying nature of its basalt. He also states that the gradings are for "rubbers and vibrams" (as opposed to nailed boots), indicating the newness of this imported footwear technology from Europe, as well as its enabling role in opening-up the friction-poor basalt of the Rock to climbing exploration:

As a rock-climbing practice ground, Dumbarton Rock has been sadly neglected, and it is only in the last year that routes and boulder problems have been opened up. 'The Rock' is superior to the 'Whangie',[†] and this guide is written with a view to publicising its potentiality. There are over twenty routes on the face, and over fifty boulder problems, which although often ridiculously short present the climber with a pleasant evening's climbing, and the difficulty of

[†] The 'Whangie' is a unique basalt outcrop located on the flanks of Auchineden Hill in the Kilpatrick Hills. Despite the somewhat friable rock noted by Shields, the Whangie was a long popular climbing destination due to its distinctive pinnacles and open views towards Loch Lomond and the Southern Highlands.

many is formidable. The rock is igneous, slabby, and unclimbable when wet. It dries remarkably quickly, twenty minutes being on average time after a heavy rainfall. The Guide is in two parts – the Boulder Problems and the Face Climbs. The routes are graded for rubbers or vibrams, and the gradings are the usual ones – Moderate, Difficult, Severe and Very Severe. None of the routes is climbed by combined tactics, and for the boulder problems (with the exception of one) no equipment is necessary.

Following this introduction, Shields sets out the spatial parameters of the Rock's climbing area, providing a bird's eye view of its north-west face and boulders (see Figure 20). Each boulder is lettered for navigational reference, with the main routes on the north-west face (referred to as the Castle Face) marked by an x. The guide is organised according to the individually lettered boulders with the name, grade and a short description of each problem listed, as well as the date of its first ascent, and the names of its first ascensionists. To provide a visual reference, each boulder is represented by a hand-drawn topo, illustrating the trajectories of each individual problem (see Figure 21). In many cases, these figurative inscriptions of climbs were made material, with Shields scratching arrows and even numbers onto the Rock's basalt surface to indicate the starting point of specific climbs, some of which remain visible today. Following the boulder problems, Shields provides details of the climbing routes on the Rock's cliff faces, complete with full descriptions and topos.

The Winfield guide provides a fascinating snapshot of the pioneering years of the Rock's exploratory mapping, quantification, and subsequent representation as a climbing landscape-as-text. As illustrated in the introduction to this chapter, the Rock had long provided a point of interest for artists as a distinct civil landmark or sublime backdrop, but in Shields' guide we see the same scene at close quarters, often at the measure of no-more than an arm's length, with each rock face and boulder detailed through a proximate graphical representation. Although reproduced in simple line and shade, Shields' hand-drawn topos capture the angular, blocky and cubist nature of the Rock's boulders and faces (see Figure 22 & 23). In the plain blue biro of the Winfield guide then, we see the Rock through the eyes of Shields; no longer an object for the sublime visual gaze, but one delineated into boulder and cliff face, name and grade, letter and number; an entirely new landscape to be grappled with.

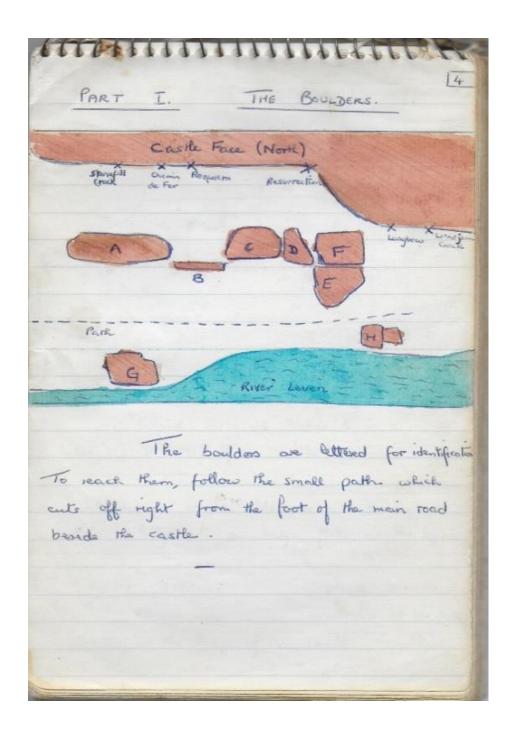


Figure 20: Topo of the Rock's boulders and main face (Image: Brian Shields)

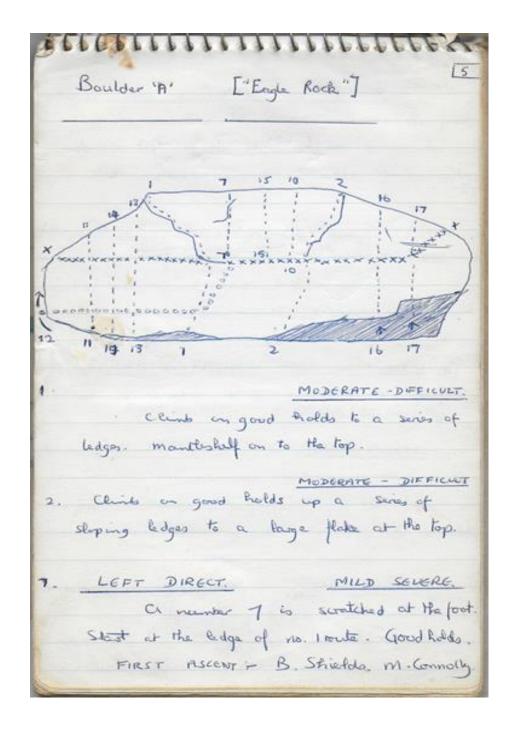


Figure 21: Boulder A 'Eagle Rock' (Image: Brian Shields)

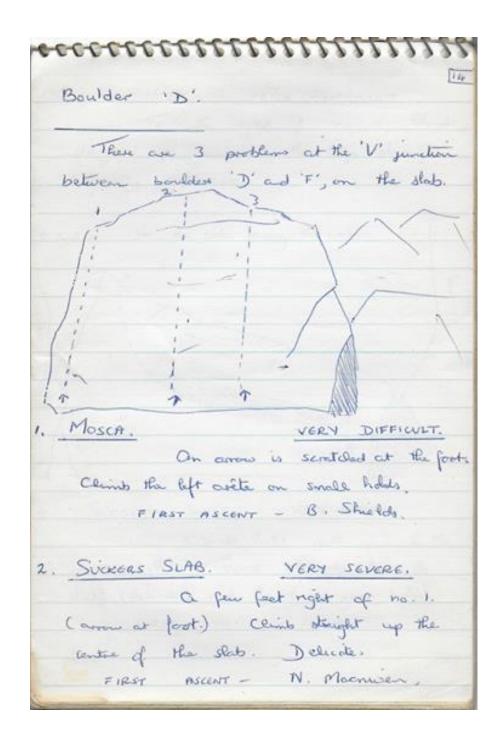


Figure 22: Boulder D (Image: Brian Shields)

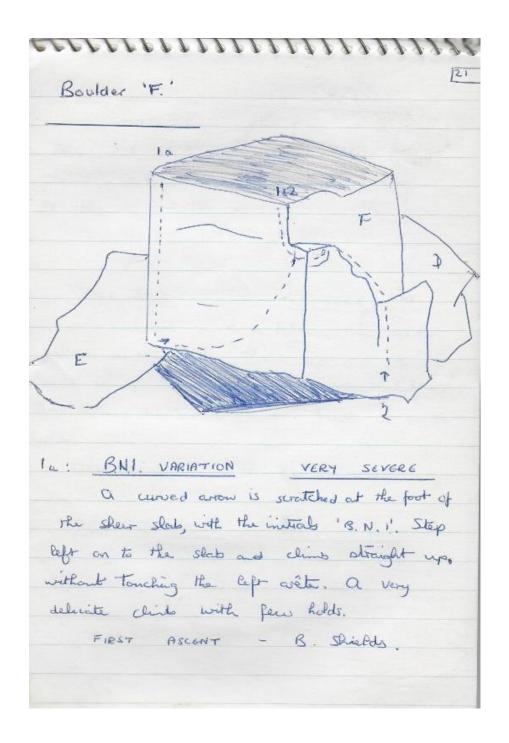


Figure 23: Boulder F (Image: Brian Shields)

All of the climbs mapped in the guide were established between 1963 and 1964 with the majority of these a result of the pioneering partnership of Brian Shields and Neil MacNiven. After MacNiven's death, Shields established new routes primarily with Michael (Silver) Connolly, as well as J. R. Houston, C. Baillie and K. Haggerty. As an act of inscriptive commemoration, in December 1964 Shields and Connolly climbed a new route on the Rock's north face, naming it *The Neilweg* to set in stone the memory of their friend and climbing partner MacNiven. In the same month, Shields and Connolly ascended *Requiem* by aid climbing technique, referred to by Shields as the "last great problem of Dumbarton Rock". As the soaring central crack-line cutting up the centre of the Rock's imposing northwest face, then as now, Requiem is the Rock's finest and most aesthetic line, continually drawing the eye to its sublime rock architecture; a central pillar in the Rock's climbing landscape (see Figure 24). The alpha-numeric A4 aid-grade applied to Requiem by Shields indicates the extreme undertaking it posed, with a 'qualitative translation' of "serious aid: lots of danger. 60 to 100 foot fall potentials common, with uncertain landings far below". 42 Indeed, Shields' detailed description of *Requiem* in the Winfield guide provides a compelling insight into the technical, physical and cerebral challenges posed by its first-ascent:

<u>Requiem 150ft A.4.</u>

The 'last great problem' of Dumbarton Rock – the centre crack of the North Face overhang. Climb up the first few pegs of 'Chemin de Fer' and traverse diagonally right on pegs and expansion bolts to the foot of the centre crack, which climbs on pegs and wedges until it peters out; then use expansion bolts to reach the top of the face. The route is climbed in one run-out. The traverse-flake is dangerously loose, and could certainly 'unzip' if the first peg in the main crack were to come out. Exposure in extreme. <u>FIRST ASCENT</u> – B. Shields & M. Connolly (Dec. 1964).

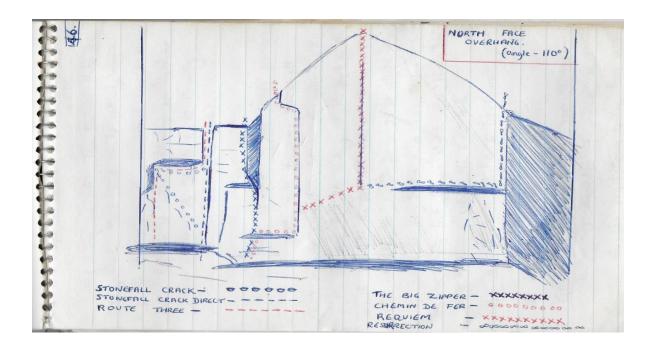


Figure 24: The inscription of the Rock's main north-west face with *Requiem* cutting straight up the middle (Image: Brian Shields)

As well as being textually described and graphically represented, Shields quantified climbs through the application of the grading system widely in use at the time, with a scale of A1 to A5 for aid routes, and Difficult (D), Very Difficult (VD), Severe (S) and Very Severe (VS) for free climbs and boulder problems. Both systems remain in use, though the latter has been amended and extended to account for increased factors of difficulty by the addition of Hard Very Severe (HVS) and a series of Extreme (E) grades from 1 to 11 (see Appendix 1). Indeed, many of the routes established in the Rock's pioneering age are now graded as HVS and E-grades, with VS being the hardest grade conceptualised at the time. It should also be noted that the bouldering grades originally applied by Shields and his cohort have since been superceded and translated to the 'Font' grading system, originating from the world-renowned bouldering venue of Fontainebleau, France. The importance of grading in the organisation of climbing space, then and now, is evidenced by Shields' listing of the Rock's boulder problems and routes in order of diminishing severity for easy reference, as well as the use of asterisks to indicate climbs that are deemed to be of particularly high quality (see Figures 25 & 26). Both such classificatory and symbolic conventions are still utilised in guidebook production today. Wary of the subjectivities of grading climbs and the likeliness of grade contestation, Shields included a proviso to the graded list of boulder problems, at the same time aiming a barbed jibe at climbers growing fixated with the grade

of a climb (as opposed to its qualities of movement) and obsessively "ticking-off" climbs; in much the same manner that the near-compulsive "munro-bagger" ticks-off mountain summits (Lorimer and Lund 2003): "This list is only a rough guide, the opinion of the author and others, and should not be taken too seriously. It will prove a treat for the guide book 'tickers-off', and others can spend many happy hours criticising it".

CLASSIFICATION OF ROUTES. [29	
	, and should not be taken
	ill prove a treat for the
	If " and others can spend
	continuing it.
E TOUR TOURS	i are marked by an asteriok]
VERY SEVERE	VERY SEVERE.
Route Royale (16) *	Suckers Slab (D2)
BNI variation (Fla)	Suckers Slab (D2) Girale of Boulder H. (43) Execution (G3)
BNI (FI) *	Deo Gratics (F3)
Short Notice (H2)	Start (E5)
The Switch Direct (c 5a)	Centre Direct (A15)
The Switch (cs) *	Gardner's Girale (Gb)
Skint Knuckles (£6)	Tuesday Treat (47)
Pas Encore (C3) *	
Nemesis (54)	
	Sorxante - Neuf (A14)
Snooker Shelf (D4)	Dic. 9
Hard Cheddar Direct (83)	Artificial

Figure 25: Graded list of boulder problems in diminishing severity with recommended problems marked with an asterisk (*Image: Brian Shields*)

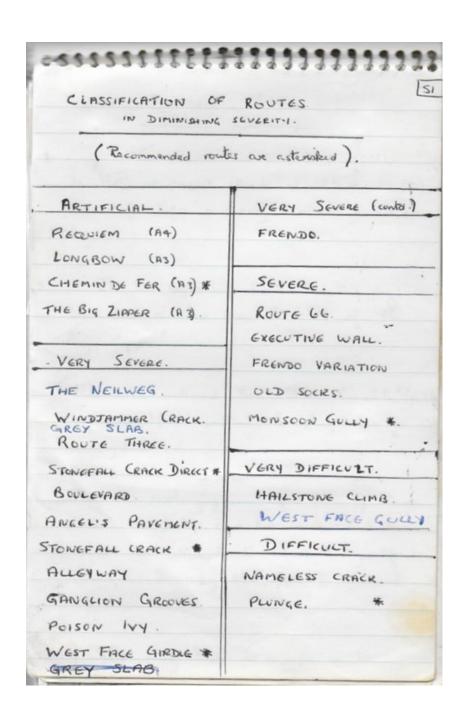


Figure 26: Graded list of routes in diminishing severity with recommended routes marked by an asterisk (*Image: Brian Shields*)

The Winfield guide is also notable for the inclusion of several monochrome photographs of Shields and his cohort climbing at the Rock. As well as providing a valuable visual record of this pioneering age and its differing socio-technical practices, we see the climbing body in action; a historical snapshot of the first performances of the Rock's climbing routes (see Figures 27 & 28). The use of photography continues to be a central element in guidebook production, deployed to showcase aspects of climbs that are beyond textual description, as well as communicating the particular sense of place and distinct rock architecture of a climbing area.

As "a spatial record of rock climbers' conversion of space into place" (Nettlefold and Stratford 1999: 137), the Winfield guide provides a remarkable and unique insight. In its pages there exists the first 'essayings' of the Rock's representation as a landscape-as-text, its homogenous basalt translated into defined objects via the textual inscription of named, graded and described routes. Today, the imagined routes of Shields and MacNiven are, in one sense, set in stone, and in another, continually reproduced and retold through their ongoing, embodied performance. It was this exploratory and generative period of vertical groundwork and place-making that laid down the foundations that the Rock's subsequent climbing communities have built upon. Though materially unchanged since the inception of its climbing landscape, a highly meaningful, "invisible archaeology" (Hale *et al* 2017) is scrawled across its complex rock architecture. Where the lay person is likely to see a sublime but ultimately unreadable sprawl of basalt, the climbing community spies a meshwork of lines, grades, names, people, stories and events, all of which are underpinned by a territorial, kinaesthetic engagement with its landscape through 'dwelling'. As Tuan so eloquently describes the distinction in ways of seeing:

Outsiders say 'nature', because the environment seems barely touched. Insiders see...an environment that is familiar to them, not because they have materially transformed it but because they have named it. It is their place — their world — through the casting of a linguistic net (Tuan 1991: 686).



Figure 27: Brian Shields climbing Ganglion Grooves, with Kenny Haggerty belaying (Image: Brian Shields)



Figure 28: Brian Shields aid-climbing what he referred to as "the last great problem of Dumbarton Rock", *Requiem (Image: Brian Shields)*

Interlude: landscape-as-body

If the Winfield guide offers compelling insights into the very first textualisation of the Rock's climbing landscape, it is important to remember that its abstractions were borne from the dynamic movement and tactile engagement of fleshy, climbing bodies (see Figures 27 & 28). Indeed, while Nettlefold and Stratford's analysis of guidebook conventions is eminently applicable in seeking to understand the role of language and text in the social construction of the Rock's climbing landscape (1999), the tight focus on textual representation can neglect the fact that rock climbing is, by dint of its physicality, an inherently embodied, tactile, and performative act. Climbing's corporeality is evidenced by the descriptive wordscapes of guidebooks which are riddled with the language of touch, movement and the "more-than-representational" (Lorimer 2005). A selection of terms used in the textual description of problems at the Rock in *Lowland Outcrops* (2004) illustrates the tactile, grasping, kinaesthetic, experiential and performative dimension of climbing that exist within (perhaps alongside or sometimes even beyond) its textual description:

sloper, sidepull, micro, crimps, jugs, pull, slab, dyno, mantleshelf, slap, blind, reachy, edge, stretch, sustained, desperate, sharp, protruding, crozzly, difficult, threatening, technical, arete, flat, sloping, dirty, committing, direct, blunt, ledges, thin, bulge, smooth, awkward, slanting, kneebar, shallow, sharp, pockets, groove, campus, incuts, ribs, tiny, flake, delicate, grossly, razor, lunge, twist, powerful, aggressive, poor, polished, handrail, span, foot-hook, rock-over, cruise, steep, traverse, nice, layback, lip, dynamically, leaning, smeary, face, serious, deep, strenuous, bold, overhang, minute, break, horizontal, crack

In a bid to better grasp the Rock's multi-faceted climbing landscape then, we must remain attentive to its kinaesthetic, more-than-representational aspects, as well as its textual and pictorial reproduction in guidebooks. This does not mean that Nettlefold and Stratford's textual analysis should be discarded. Rather that it should be contextualised alongside more recent work. Indeed, as Rickly states, the relationality of individual climbing bodies, communities and media in the (re)production of climbing space, in fact, demonstrate "the complementarity of landscape-body and landscape-as-text perspectives" (2017: 69).

Rickly ties the conceptual strands of body and text together via the spatial philosophy of Henri Lefebvre, by which:

...space is not an absolute given, an empty and presumed starting point, but space is produced through human action...there is a material basis to the production of space – the 'practical and fleshy body'. The body must be conceived as both active in the production of space and produced by space, and as a result, subject to the determinants of space (2017: 71).

Put simply, the landscape-as-text and landscape-as-body are co-produced, with the representation of climbing spaces in guidebooks informed initially by the bodily practice of rock climbing. Once circulated, the textual landscapes represented in guidebooks strongly influence the performance of the subsequent textual community that utilise them. However, like the fluid movements of the climbing body, these representations are by no means fixed. As Rickly states:

...routes, guidebooks, and climbing media are representations as doings when they influence the perceived space of the rock face and spatial practice of the climber. Representations, like ideology, have no inherent power; they circulate in the world only through their continual (re) production. This means they also always hold the potential to be challenged, adapted, adjusted, and dismantled (2017: 83).

Such an outcome is evidenced in the changing climbing practices at the Rock where the aidroutes of the 1960s were reinvented as free-climbs in the late 1970s and 1980s, which in effect are now considered as their 'genuine' first ascents; as well as the adaptation and extension of existing bouldering problems to provide newer, harder challenges. The need for spatial representations to be continually reproduced to 'exert power' is also evidenced by the fact that the Rock's 1960s and 1970s north face routes have long since been 'forgotten' and reclaimed by vegetation, due to the focus of later practice falling upon the greater challenges of the north-west face and its boulders.

Accordingly, the textual and quantitative abstractions of guidebooks should not be considered as 'non-negotiable', or existing outside bodily practice in a hermetically sealed realm. Instead, they should be considered as "embedded within, and integral to, sensuous performances of nature" (Lorimer & Lund 2003). Though focused on the pursuit of Munrobagging as opposed to climbing, Lorimer and Lund display the same conceptual commitment to the complementarity of the landscape-as-text and landscape-as-body as Rickly, stating that "numbers, facts, rules and bearings are not mere abstractions but are themselves

generated through certain kinds of embodied, emplaced and socially situated performance" (2003: 131).

As well as existing as a textual landscape, the Rock's climbing culture is expressed in a phenomenological weave of individual, embodied acts of engagement with landscape, and countless, fleeting encounters between people and place which, drawn together, form a community of practice around a shared culture of movement. As Ness states, "corporeal movements, because of their capacity to move being out of the inconceivable to the graspable, are of first importance in any project that seeks to understand meaning-in themaking, on any scale of place or landscape" (2011: 84). Indeed, it is through corporeal movements that a specialised and localised set of cultural practices has surfaced at Dumbarton Rock, gaining wider recognition as a vibrant and distinctly Scottish sporting heritage. It is to these more intangible, performative aspects of the Rock's climbing landscape that I turn to explore and explain in Part II of this chapter.

Part II: The Rock as a Landscape of Ritual and Performance

The Rule of Return: Just as there is love at first sight between people, there is love at first sight between a person and a place. Most of the time, however, one must return, observe, and get to know a place. Really strong places may open up only for a few hours a year. One must come here at different times of day and in different seasons. Most suitable are moments when one can no longer recognize clear boundaries of object – such as in fog or darkness. Certain places (and certain truths) show themselves only when they're not clearly visible (Cilek 2015: 166).

The Rock is a place in which Cilek's *Rule of Return* holds true. Its dense basalt seems to offer the barest minimum to the newcomer, both in terms of friction and easily useable features. Its geo-poetry is complex, and like good music, patience is necessary if its deeper qualities are to be revealed. At the risk of self-celebration, success on the hardest of its climbs requires an almost monastic dedication, sacrifice and perseverance. This unwritten 'rule of return' being reflected in the naming of many of its climbing routes: *Persistence of Vision*, *Sufferance, Endurance, Tolerance, Pressure, Dweller*. For 'Dumby' Dave MacLeod, a ritual of repeat visits was the key to successfully deciphering the Rock's cryptic surface structure:

I think the rock type was really important because it connected really well with what I enjoy out of climbing, of getting that detail of working out sequences and being really hard and exacting - everything has to be exact about the sequence. If it was more about gaining strength as it is with some other rock types, then it wouldn't have been so interesting because you can just go away and train and get stronger and you can do that anywhere. But it's because there's no substitute for understanding how to climb this particular rock type, that you do need to keep coming back to the problems to try and understand it. So that suited me really well, and that's why it was special for me and I kept coming back all the time.⁴³

As MacLeod, states "there's no substitute for understanding how to climb this particular rock type", other than hands-on experience. Although the use of artificial indoor climbing walls and their associated training aids will increase the base-level strength of a climber, they do little to prepare him or her for the technical and cognitive demands of the Rock's basalt, as "the bodily skills and capacities coproduced in the more complex and contingent climbing practice at the crag are missing from the indoor pursuit" (Barratt 2011: 402). It is a medium that must be continually grappled with to be understood. As Lewis states "touch is the pivotal sense utilized by climbers in learning to know a climb" (2000: 71).

To contextualise the Rock as a climbing landscape-as-text then, I have elected to provide an account, born of personal experience, of the embodied, tactile aspects of Dumbarton Rock's climbing culture which drive its ongoing heritage landscaping, as well as the subtle ways in

which its semi-urban sense of place are enfolded into it. Much of this draws on my own commitment to the rule of return, creating a long-term engagement with the Rock as a climber and more recently, researcher-practitioner, with landscape phenomenology and performative theories of landscape providing a conceptual lens.

Edgeland escape

To reach Dumbarton Rock's secluded climbing area, one must divert from Castle Road just before it rounds a corner to reach the castle itself and walk along an overgrown muddy path, enclosed by the bulk of the Castle Rock on one side and on the other a battered brick wall, remnant of Denny's Shipyard. Upon reaching the end of the trail, a jarring change in perspective is experienced towards the western horizon. Rounding the corner, the steep, towering north-west face looms like a tombstone that has leaned with the passage of time, the massive basalt blocks below a testament to past upheavals. The open expanse of sky and the waters of the Leven and Clyde that frame the Rock lend it an elemental, material certainty.

It is a quiet place, barring the town's faint ambient hum. It is also an excellent listening post. The waters of Firth's tidal flows are the backdrop for flotillas of mute swans, the staccato of redshanks, and more boisterous high-pitched gull squawks. The wind often plays too as it passes hurriedly over the Clyde, in the pitch of swaying trees and brashly over the eardrum. Occasional shouts drift over from Levengrove Park, and more audibly, the physical exertions of climbers whose whoops of success or anguished howls of failure puncture the calm. The escapist might imagine the constant thudding, clatter and clang of industry that once echoed off the Rock during the area's industrial heyday. It is quieter now, though a resonance hangs in the air. Visually, it is a place of edges and edginess. Angular lines of boulders and rock faces form and reform. Appearances inform the nature of the climbing, smooth basalt is an unforgiving surface for the uninitiated.

Geo-poets such as Cilek (2015) might suggest a hard place being born of a hard geology as an inevitability, with the Rock's extra-urban location resulting in a compelling mix of grit and grandeur and a distinct (New Scottish) landscape aesthetic - one informed by human industry as much as sublime nature. Imagined as a dialogue between geology and culture, the Rock's industrial history of hard-graft and its technically challenging, difficult climbing

seem to reflect one another. In later decades, the backdrop has gradually phased into a post-industrial edgeland, continuing its gritty reputation. Boulders are brightly spray-painted with graffiti art that marks this as a liminal place, located beyond the boundaries of formal spatial control. Described as being set in an "urban wastescape" by one climbing journalist (MacDonald 2007: 68), its post-industrial aesthetic of graf-tags and discarded beer cans can intimidate first-time visitors.

I recall my first visit as a novice climber in 2007 with a work colleague who had been extoling the virtues of the Rock. He provided a guiding hand, pointing me towards the more accessible climbs; names of routes were passed on and those who had climbed them, giving character and biography to its dense geology. The smooth, dark basalt was intimidating, its lack of friction shocking. It felt insecure, as if every foot placement was bound to slip. My hands over-gripped the angular rock as I tentatively ascended one of the easier warm-ups, Friar's Mantle, established during the pioneering 1960s wave of development by Shields and MacNiven. I was then led towards a classic boulder problem renowned as a 'test-piece', named *Toto* – an offbeat and angular Gary Latter composition from the 1980s (See Figure 29). Resembling a diagonal sword slash in the flank of the boulder, it required awkward feet and hand placements from the start, limbs crossed and bunched until slowly standing up and unravelling into a more comfortable position. Left hand in the crack and right hand up to a poor crimp, just enough to allow the right foot to step through to a good foothold. Under full tension and requiring complete belief that friction will keep my left foot stuck to a poor, sloping foothold, it suddenly pinged and the downward force pulled me aggressively from the boulder. I landed on the padded surface of my boulder mat. The same problem was attempted repeatedly, I refined my sequence and efficiency of movement. The puzzle continued to shrug me off. With arms and willpower beginning to falter I pulled stubbornly for 'one last go'. For no apparent reason, it suddenly felt like a dance, natural and effortless, a sense of flowing movement. I latched the finishing hold. Endorphins rushed. A classic 'Dumby' problem under my belt. Leaving with the congratulations of some old hands and regulars ringing in my ears, I was hooked. The UKC Logbook entry I made for Toto is fringed with excitement "First ever time at Dumby. Fell badly quite a few times before sending. A great introduction!".44

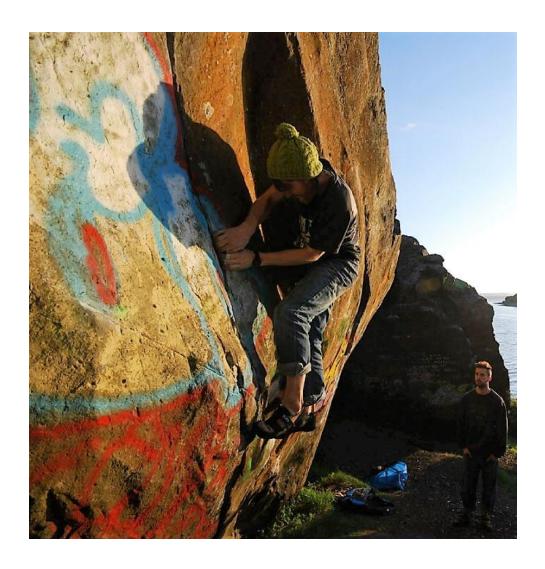


Figure 29: The author on a repeat ascent of *Toto* (*Image: Jonathan Bean*)

This heady rush of climbing initiation and geological grandeur amidst the grit of a post-industrial Clydeside proved an intoxicating mix. Like a Geddesian 'Outlook Tower' the Rock has provided a personal anchor point to cast forth to the world; its vista a form of "panoramic regional survey" from which to better apprehend the "human-landscape interrelationships" at play (Geddes in Steinitz 2008:71). Indeed, from the poetic confluence of two rivers, the views afforded to the north-west across post-industrial edgeland, tower blocks, kirk steeples and urban sprawl to finally rest upon the armchair outline of Ben Lomond, appeared to lay bare the geographical essence of Scotland. The Highland idyll and the urban reality, both sublime and mundane, wealthy and deprived, confident and downcast, historical and modern. Here was a place of time out of mind where human history had eddied and swirled - the Rock unmoving amidst the shifting material culture around it (see Figure 30).



Figure 30: The view north-west from the Rock towards Dumbarton and Ben Lomond. The large red brick tower, the final remnant of Ballantine's Whisky Grain Distillery constructed in 1938 was demolished in 2017. For many years it stood as a reminder of Dumbarton's industrial past (*Image: Matthew Thompson*)

Across the intervening years I have continually returned to the Rock, working my way through its many climbing routes and boulder problems. As my 'local', it has been a personal yardstick for gathering abilities as a rock climber, and the scene of my most difficult climbs. It has inscribed itself upon my body, in increased muscle mass, thickened tendons and calloused skin (Lewis 2000). I know the Rock, perhaps better than any other place. It has offered a point of continuity and contact amidst the uncertainties and fluxes of life, offering stability and solace as well as a sense of ongoing self-improvement. It has provided community and deep companionship, its climbs requiring the trust of another to hold your ropes or to spot you attentively. In my mind, I can recall its landscape intimately as a series of movements, experiences and memories. I can recall every handhold and foot placement on particular routes and problems - the feel of individual handholds and the configuration of tensions exerted on the body. For me, it is the "small place" that Cilek speaks of: "A small place with which I resonate is more important than a large pilgrimage site where I am only a visitor" (2015: 164), or what the Finns call *sielunmaisema*, "the soul landscape" - a

particular place carried deep in the heart and often returned to in memory or in person.⁴⁵ As Andy Gallagher, the Rock's leading climber of the 1990s reflected, "It's one of those places that just gets right into your soul and your heart, and slowly but surely it keeps pulling you there, and pulling you there, and you're back".⁴⁶

With regards to understanding my sustained encounter with the climbing landscape of Dumbarton Rock and the knowledge I have gained through it, landscape phenomenology resonates deeply, providing a conceptual basis for the highly embodied and tactile nature of rock climbing, and the manner in which the wider landscape is enfolded into its practice. As Wylie states:

In general, the proliferation of research on the body and embodied experience turns landscape from a distant object or spectacle to be visually surveyed to an up-close, intimate and proximate material milieu of engagement and practice. Landscape becomes the close-at-hand, that which is both touching and touched, an affective handling through which self and world emerge and entwine. In this way also notions of *landscape* begin to merge with notions of *place*; landscape and place conjoin intimacy, locality and tactile inhabitation (2007: 167).

"Intimacy, locality and tactile inhabitation" provide the basis of my own sustained encounter with Dumbarton Rock, and it finds conceptual expression in Ingold's notion of the dwelling perspective and landscape temporality. For Ingold (2000), the "temporality of the landscape" is bound up in the everyday rhythms or "taskscapes" of dwelling. Its temporality is thus "phenomenologically grounded in lived, corporeal experiences" (Wylie 2007: 161), as opposed to the detached linear chronology of universal time. Temporality, is thus reconfigured as part of the landscape, as opposed to something external to it. Although the act of rock climbing requires a tight focus and narrowing of attention, it also takes place within a wider sphere of dwelling in which the temporal aspects of the landscape become more apparent: clouds morph, light shifts, tides and sound ebb and flow, birds pass or idle. As Ingold states, "the landscape becomes a part of us, just as we are a part of it" (2000: 191). Dave MacLeod eloquently captures this intermeshing of people and place with particular reference to bouldering, which often involves a near monastic dedication, spent in reverence to a particular 'problem' at the limits of one's physical capabilities:

Bouldering lends itself to this focus on detail because we stay so long in one place. Most of climbing involves travelling over landscape. There isn't time or opportunity to sit and watch the tide change or the light go orange on the rock between attempts. In other branches of climbing, far too often there are more pressing priorities than sitting watching a robin finish

the crumbs of your sandwich. When we have to sit on the mat and rest, we start to see more than we realised was there (in Watson 2007: 63).

As MacLeod describes, the act of climbing is inherently a form of dwelling, with its sustained practical activities taking place in and amongst the ongoing milieu of the wider landscape – of changing light, temperature, tide, weather, sound, and the activities of non-human life. Bouldering in particular, involves sustained periods of rest between attempts, allowing one time to contemplate and observe one's surroundings; from the minute-scale of individual climbing holds to the far expanses of the horizon. It is via the practical activities or taskscapes of dwelling then, that "body and environment fold into one another and co-construct each other through a series of practices and relations" (Wylie 2007: 144).

With specific regard to rock climbing, the notion of practice also conjoins that of performance, the latter term arguably better capturing a dramaturgy and creative sensibility, as well as the equivalent role of the body in the production of climbing landscapes. Although the climbing body is inflected and 'put into practice' through the spatial and textual representations of the climbing guidebook; in the act of climbing itself, "lived and perceived spaces" are foregrounded (Rickly 2017: 75). Up-close and pressed against the materiality of the rock, the distanced and 'objective' gaze of the guidebook falls away as the climber's focus is centred on an area only a few feet in radius around the body and the often-limited sightlines that the rock architecture offers. In this state of relative myopia, touch becomes the pivotal sense for communicating the 'feel' of the climb, as fingers and hands grasp an array of differing hold types, the material dimensions of which ultimately determine the difficulty of a climb. Lewis writes "for the rock-climber it is the hands, all fingers crimping and fists jamming, and the sense of touch, that communicate most readily, the state of play of climbing. It is the hand that communicates the informational content of knowledge of a particular climb" (2000: 71). Indeed, though a climber can consult the guidebook to determine the grade of a route, as well as visually 'read it' from below to try and pre-empt its difficulties, she can only truly know the route and its material realities via the embodied practice of climbing it.

In this manner, climbing an individual route or problem is an inherently performative act, requiring the execution of a particular sequence of embodied movements, though the terms of this engagement vary according to differing socio-technical practices. To expand, 'onsight' climbing involves no prior knowledge of a given route, forcing the climber to

creatively improvise the required movements and gear placements. Due to the uncertainty of onsight climbing and the extra energy required to react to the vagaries of the climb, it is considered as one of the purest forms of climbing performance and the greatest test of a climber's skillset. The onsight ethic is strongly bound to traditional climbing in the UK with the aspects of uncertainty, adventure and the management of risk at its core (Lewis 2000).

With regards to sport climbing and bouldering however, the focus generally falls on maximum athletic difficulty, and as such, climbs of this style are generally pre-rehearsed and practiced prior to their performance. Climbers rehearse, or 'work' a route by breaking it down into its constituent moves or sections, performing them repeatedly to find the most efficient sequence. This process involves a large degree of creative praxis, with moves being executed according to the kinaesthetic idiosyncrasies and preferences of the climber. Depending on the relative difficulty of the climb, this process of pre-rehearsal may be a matter of minutes, hours, days, weeks, months or even years. To successfully complete (or 'send') the climb, it must be ascended seamlessly from bottom to top, with no falls or rests on the rope. As Rickly states, "over time, the climber learns a specific choreography for each route climbed – a choreographic movement the climber can readily recite off the rock face as an embodied knowledge" (2017: 74). Often, this embodied knowledge or 'beta' is communicated and discussed with other climbers through a range of physical gestures, with language alone insufficient to convey the more-than-representational movements of the climb (Rickly 2017: 77). For Lewis, this embodied knowledge amounts to "a corporeal knowing rather than a cognitive knowing [that] represents an inversion of modernity's emphasis upon the dominance of the text as the source of knowledge" (2000: 71). Due to the minutely refined and rehearsed nature of the climber's sequence of movements it is unequivocally, a performance, even a dance. When aligning such notions of bodily performativity with landscape phenomenology, landscape becomes a doing as opposed to something done, an ongoing process that emerges through "embodied acts of landscaping" (Lorimer 2005: 85), and in the "expressive-poetics of spacing" between representation and practice (Crouch 2010: 5).

In this sense, the Rock's climbing landscape emerges in the "expressive-poetics of spacing" between its landscape-as-text and landscape-as-body, in which the spatial abstractions and quantifications of the guidebook, "while by no means fixed or permanent, are important presences and significations in the performance of nature" (Lorimer & Lund 2003: 142).

However, though the Rock's textual and corporeal landscapes are poised in a mutual relationship of co-production, there is a clear disparity in their tangibility. The Rock's landscape-as-text can be clearly apprehended in the various guidebooks and online spaces which reproduce its abstractions, inscriptions and quantifications. It can be held, looked at, carried, or stored on a bookshelf. The Rock's performative landscape however, has no such singular material basis, barring the lines of white chalk that mark up its climbing routes. Accumulated through their repeated performance by different climbers, like a physical graffiti, these chalk marks remain only as the abstraction of fleeting movements. This absence of material evidence of the Rock's embodied climbing landscape is indicative of its more-than-representational nature and its "invisible archaeology" (Hale *et al* 2017).

While the ongoing, embodied practice of climbing emerges in the "present moment of practice" (Jones 2011), it is also important to go beyond the self and the 'now' in the unfolding of landscape, "to acknowledge that there is temporal depth and connection, even in the so called fleeting and momentary" (Harvey 2015: 920). To do so, Harvey contends, we must acknowledge the perceiving 'self' as a contingent practice, resulting "from collaboration between individuals, groups and objects" in the past as well as the "emerging present" (2015: 920). From this perspective, we can consider the Rock's climbing routes as time-deepened lines, whose ongoing performance is inherently connected to those who have gone before in an act of heritage landscaping. The notion of the self as a contingent practice is also one which finds salience at the Rock, as the performing climbing body is one dependent on a variety of enabling, more-than-human technologies.

Technology: the hybrid climbing assemblage

Having considered the embodied nature of rock climbing as an act of heritage landscaping and the manner in which repeated practice inscribes and reconfigures the climbing body (Lewis 2000), it is important to attend to the role that non-human technology plays in augmenting the climbing body. Put simply, the production of climbing space through the bodily act of climbing, is enabled and indeed co-constituted by the non-human actants of climbing technology - namely protective climbing 'gear' (harnesses, ropes, helmets, nuts, cams, quickdraws, bolts etc.), climbing footwear (rock shoes), and protective material (bouldering mats). The paraphernalia of augmentation reminds that climbing bodies "cannot

be revered as pure natural forms" engaged in an unmediated phenomenological contact with the world but instead as co-constituted, hybrid climbing assemblages (Barratt 2011: 401).

For Barratt, the highly involved nature of climbing and the vulnerability of the body during its pursuit, brings its associated technologies into sharp focus, which in other contexts would be rendered invisible by their conspicuousness or mundanity (2012: 48). In effect, without technology, climbers would not be able to "access the outdoor worlds they crave" (Barratt 2012: 46) and subsequently produce climbing space. For instance, protective hardware such as nuts and cams allow climbs to be undertaken within reasonable measures of danger, with the potential for mortal consequences drastically reduced. Accordingly, the skills and competencies required to correctly place gear and thus 'protect' a climb are integral to its practice. This central, enabling role that technology plays in the pursuit of rock climbing is evidenced at the Rock where improving climbing technology opened new avenues of climbing space and associated socio-technical practices. To elaborate, the aid-climbing technology utilised by Shields and MacNiven in the formative period of the 1960s, allowed the pioneers to establish routes such as Chemin de Fer, The Big Zipper and Requiem, which were beyond their free-climbing abilities. In Shields' description of *The Big Zipper*, the technologically mediated nature of the route as an aid-climb is apparent: "two expansion bolts, two wedges, three jammed nuts and seven pitons were used. With the exception of one channel peg, all are in place. Protection is poor." (1964: 43). Improved climbing technology in the 1980s such as lightweight ropes, harnesses, nuts and the development of camming devices subsequently enabled the remaking of aid-routes (such as Chemin de Fer and Requiem) as free-climbs. In particular, the innovation of cams (spring-loaded devices that allow for a variable, quick and thus less strenuous placement than static protection such as nuts) opened up new vertical spaces to climbers. These devices became an integral component of modern climbing 'racks' with a near mystical status due to their intelligent design and highly enabling, "magic" functionality (Barratt 2012).

Another key agent within the hybrid climbing assemblage are 'rock shoes', which are ergonomically designed to tightly contain the foot and position the toes together in an optimal position for climbing. The rock shoe allows the foot to go beyond its normal capabilities to gain purchase on extremely marginal rock features, with the frictional interaction between sticky rubber and rock allowing upward progress even on ostensibly featureless slabs. While the hands of the climber engage in an unmediated, skin-tearing

contact with the rock (excepting the use of chalk to improve friction), the climbing foot is enabled, but also protected from the hard materiality of the rock medium by the intermediary of the rock shoe. In this sense "the climbing shoe at once mediates and transforms the dialogue between foot and rock. It acts as a co-agent, a communicator between the foot and rock and the other 'haptic knowledges' of the climber' (Barratt 2012: 404). In effect, it was innovations in footwear technology in the 1950s and 1960s that allowed Shields, MacNiven and their pioneering cohort to get to grips with the Rock in the first place, with its previously shunned friction-poor and micro-featured basalt presenting a new experimental canvas for those with the necessary technology and the concomitant skill required to wield it effectively. Improving generational standards at the Rock can be correlated with improving footwear technology, with the EB Super Gratton shoe enabling climbers to establish the Rock's first British 6a and 6b boulder problems as well as harder routes in the late 1970s. In the 1980s, the Spanish rock shoe manufacturer Boreal made significant breakthroughs in the technology of sticky rubber, an advance resulting in many of the decade's cutting edge firstascents.⁴⁷ From the 1990s onwards, the range of rock shoes available has increased exponentially, with progressively ergonomic designs and improved materials coming to market through a variety of manufacturers. In particular, increasingly asymmetric, 'aggressive' shoes have been introduced to cater for the pursuit of greater climbing difficulties on steep, overhanging walls which require extremely precise footwork on often marginal footholds, especially in the sub-discipline of bouldering.⁴⁸

The maturation of bouldering from the 1990s onwards into a fully-fledged, independent climbing discipline led to innovations not only in bouldering-oriented rock shoes, but also the bouldering mat. Indeed, the bouldering mat, which can be folded and carried resembling a rectangular, oversized backpack is a totem of the pursuit. Placed at the base of a climb, the foam padding of the bouldering mat provides a cushioned surface for the climber to land on in case of a fall, mitigating the risk of injury. Through their modification of the climbing environment and extension of corporeal limits, bouldering mats exert spatial implications (Barratt 2012: 406) (see Figure 31).



Figure 31: Alan Cassidy on the near horizontal terrain of *Hokku* - a modern boulder problem enabled by the technology of bouldering mats (*Image: Helen Cassidy*)

In effect, the physical and psychological assurances of the bouldering mat in tandem with advances in bouldering standards, have altered perceptions of what is considered climbable, thus opening up new spaces of climbing practice. The spatial influence of the bouldering mat and the concomitant emergence of bouldering as an independent climbing discipline is one that has played out on the Rock's basalt. For instance, of the 50 bouldering problems established by Shields and MacNiven in the 1960s and recorded in the Winfield guide, the majority tend to be short enough to be non-lethal in the case of a fall, or oppositely, tall enough to be considered 'mini-routes' with a 'falling not an option' label attached. The non-existence of bouldering mats in the 1960s is clearly apparent in Shields' description of the boulder problem *Pongo*, which at the time was aid-climbed with the use of pegs: "Just left of 'Sorcerer's Slab', on the overhanging wall, a thin crack can be seen. Climb it, using five pegs. The pegs tend to bounce out, but the grass is reasonable to land on" (1964: 20). The subsequent development of the Rock as a bouldering venue is illustrated by the fact that approximately 35 years later in 1998, Malcolm Smith climbed the same thin crack described

by Shields to establish *Pongo Sit Start* – the Rock's first Font 8a boulder problem. The 1990s onwards saw bouldering come of age at the Rock, with bouldering mats and a general increase in climbing standards opening-up hitherto unimagined problems. While retaining a serious reputation, bouldering mats undoubtedly softened the implications of falling from the Rock's many highball boulder problems and uneven, broken landings. Such has been the profusion of bouldering at the Rock that for many climbers, it is utilised primarily as a bouldering venue, with the looming north-west face providing more of a sublime backdrop than a climbing arena in itself. Accordingly, the 2004 edition of the *Lowland Outcrops* guidebook describes the Rock as "arguably Scotland's finest and most intense bouldering venue, ranking among the best in the UK", while in 2013 a bouldering-specific guide was published by Stone Country Press entitled *Dumby Bloc*; the use of the French word *bloc* (meaning block/boulder) a reference to the world-renowned bouldering venue of Fontainebleau, France, and the Rock's playful pseudonym as "The Black Fontainebleau" (Watson 2005: 27).

In sum, climbing technology is so integral to its practice and so enmeshed with the climbing body that its enabling role is easily overlooked. However, as Barratt's application of Actor Network Theory shows, the climbing body is a more-than-human fusion within a technologically mediated pursuit (2011). As well as being a culture of the text and the body, we can also consider the Rock's climbing culture as one that has been directly shaped by technology. Indeed, the relatively late emergence of the Rock as a catalyst for climbing and the subsequent production of its climbing landscape was in large part due to technological limitations. Only when footwear technology improved sufficiently were the sport's skilled practitioners able to realise the climbing potential of its smooth basalt – transforming mute rock into a symphony of kinaesthetic movement. When apprehending the Rock's climbing landscape then, we must not only consider the interplay between its textual and embodied properties, but also the manner in which non-human technology is enfolded into this exchange. As Barratt (2011: 409) states, "Climbers and their technology have access to a vertical space not available to others. The hybrid climbing assemblage can go places where others cannot. Therefore, climbers are able to create their own geographies particular to the activity and its venues. These spaces are continually constructed and reconstructed in a highly embodied manner through the act of climbing" (Barratt 2011: 409).

Post-phenomenology

As "human-non-human interplay is ubiquitous in climbing" (Barratt 2011: 401), it is appropriate to consider the non-human materiality of the rock medium itself. In attempting to apprehend the multi-faceted climbing landscape of Dumbarton Rock, it is important not to relegate materiality, to mere background matter. As Ash and Simpson state "objects have an autonomous existence outside of the ways they appear to or are used by human beings" (2014: 1). Far from being a passive medium upon which the practice of climbing is performed, rock exerts its own form of agency: "what happens in every second of every climb is dictated by the rock and its environment, its geological past and its present ecosystems; from birth to scouring weather, to colonization by plant or animal" (Howett 2004: 62). Such a statement has salience at the Rock, where its volcanic origins formed an extremely dense, igneous rock that has withstood millions of years of weathering; its clean faces an outcome of its sheerness and impenetrability to colonising plants. Although mute by nature, it is by no means a homogenous medium on which to climb. Indeed, due to its proximity to tidal waters and notorious smoothness, Dumbarton Rock is a very 'conditions dependent' place to climb. If too cold, the rock becomes 'glassy', if too hot, 'sweaty' or 'greasy'. Often, it is best after a cleansing rain shower, when due to its compact nature a light breeze dries the basalt quickly, resulting in what regulars of the scene refer to as "sticky damp" (Watson 2013: 7). Such climatic concerns serve as a reminder that embodied landscape experience and knowledge accrues not only through the hard materiality of the ground but within the "weather-world" which envelops it (Ingold 2010). Indeed, the weather provides a continual point of concern and environmental reference for the climber, with precipitation a scourge. Accordingly, a range of adjectives are often exchanged between climbers when trying to pin down how the rock medium feels on a particular day, with sudden shifts in weather such as a cooling breeze providing optimal friction for only short windows. In this sense, an embodied knowledge of the Rock's climbing landscape extends to an ability to read and understand the atmosphere that surrounds it. As Ingold states, "though it may not exactly melt into air, the body certainly walks, breathes, feels, and knows in it" (2010: 136).

In sum, to apprehend the Rock's situated climbing landscape and its associated culture, we must be attentive to the various ways in which it unfolds as a process of heritage landscaping. In the many guidebooks published on the Rock over the years, we can trace its "conversion"

from space into place" (Nettlefold & Stratford 1999: 137) and the production of its textual landscape: from the pathfinding years of Shields and MacNiven to its now well-trodden and intensely inscribed nature. The introductory history sections of guidebooks, while concise, also provide something of a conventional archival record, with a backward glance cast at significant periods and waves of development defined by changing cultural trends and sociotechnical practices. However, to understand the Rock's climbing landscape we must also consider its inherently embodied nature. Though the spatial abstractions contained within guidebooks are hugely influential upon the act of climbing, they must be understood as coproduced and re-produced by the climbing body, as "social and performed entities" (Lorimer & Lund 2003: 142). In this manner, we can consider the Rock's climbing landscape as one that is ongoing, practical and performed as much as it is fixed by representational devices. However, as a technologically mediated practice in which "human-non-human interplay is ubiquitous", it is important to move beyond the 'pure' phenomenological body, to consider it instead as a more-than-human hybrid climbing assemblage – enhanced, augmented and enabled to produce vertical worlds by various climbing technologies (Barratt 2011: 401). Finally, we must consider the Rock itself not as a passive background upon which cultural values are inscribed – but as a "Stone Voice" that exerts its own agencies upon the cultural landscapes drawn into conversation with it (Hansom 2012: 175).

Graffiti and heritage



Figure 32: Graffiti at the Rock, 2008, reading "This Place is Shit" (Image: author)

Having considered the Rock's climbing landscape in various ways, this chapter now turns to consider its wider heritage and compelling location within the bounds of an Ancient Scheduled Monument of National Importance. In this regard, the Rock is rare, with many monumental sites defined by "fixed memories, overcoded heritage and ceremonial space" that leave little room for alternative conceptions of place to emerge (Edensor: 2005: 845). This is an unusual situation, made all the more striking when one tries to imagine a similar situation at Dumbarton Rock's more famous basalt cousins of Edinburgh or Stirling castle rocks. Indeed, one of only two named and recorded climbs on Edinburgh's castle rock 'Breach of the Peace', signals to the subsequent fate of its first (and only) ascensionists in 1987 (Prentice 2004: 361).

The unlikely emergence of the Rock's climbing culture within a designated heritage site is an outcome of its specific geographies. To elaborate, the Rock's regional location on the western periphery of the Scottish mainland lies outwith the country's main tourist trails, with visitor numbers a fraction of those enjoyed by Edinburgh and Stirling Castles.‡ More important though is the Rock's local topography, which has provided a sequestered space for its climbing community to emerge, away from the regulated space suggested by its official designation. While, the Rock's climbing area is centred on its north-west face and boulders below, its castle entrance and touristic operations are effectively antipodal, located on its southern aspect. Though the castle's operations extend to the Rock's summit, its climbing landscape lies largely out of view under the overhang of the north-west face.

Removed from Dumbarton's town centre and with a surrounding patchwork of post-industrial spaces, the Rock's north-west possesses "edgeland" qualities (Farley & Symmons Roberts 2011). Though technically within the Rock's designated heritage boundaries, it is a liminal space, a commons in which the regulatory frameworks of codified space are largely absent (see Figure 32). This absence of formal control is signified by the detritus of edgeland occupancy: climber's chalk, scrawls of graffiti, discarded beer cans, smashed bottles, shopping trolleys and a shifting miscellany of throwaway consumer capitalism washed up by the Leven and the Clyde. Due to this spatial and conceptual separation from the Rock's touristic operations then, its north-west area has provided a "latent space" for what De Silvey and Edensor term "adult play": "adventure sports...alcohol and drug-use, and graffiti composition" (2012: 475-476).

Though the Rock's north-west portion is utilised for various forms of adult play as well as more conventional recreational uses such as fishing and dog walking, it is most often inhabited by climbers, whose tell-tale white chalk marks appear almost as territorial markers. In considering the Rock's climbing heritage then, we must focus upon its site and source, the north-west area and its associated climbing landscape. Indeed, the material substrate in which heritage and memory are nurtured is that of landscape; as Wylie considers "a series of critical questions connect cultural landscapes up with memorial and heritage politics - at the most basic level, what is remembered and why?" (2007: 191). The modern emergence of the Rock's climbing cultural landscape, and its largely intangible, dynamic and 'ground-up' social values (Jones 2016) sit in contradistinction to the more static, conventional

[‡] In 2018 Edinburgh Castle attracted 2,111,578 visitors, Stirling Castle 605,421, and Dumbarton Castle 28,546 respectively.⁴⁹

heritage fabric of its castle. As such, the Rock provides a valuable resource for examining the subjective, processual nature of heritage, and how we might better appreciate and legislate for its less conventional forms.

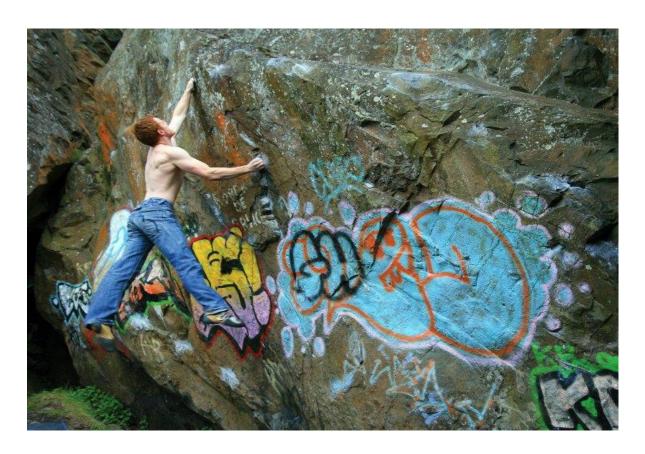


Figure 33: Chris Everett climbing *The Shield*. Note the 'historic' Robert de Bruce graffiti on the shield feature (*Image: Fraser Harle*)

In approaching heritage values at the Rock, both as subject and art-style, graffiti represents a useful and colourful illustration. Defined by the Oxford Dictionary as "writing or drawings scribbled, scratched, or sprayed illicitly on a wall or other surface in a public place" graffiti has long been emblematic of Dumbarton Rock's semi-urban sense of place (see Figure 33). Inscribed initials dated 1849 are still visible alongside the brightly coloured calligraphy of modern graffiti. Indeed, Brian Shields inscribed the Rock with his own form of graffiti, scratching in arrows and numbers to indicate the starting point of boulder problems and routes. Accordingly, in the summer of 2012, it was the subject of graffiti and what was perceived as its transgressive nature as "matter out of place" (Cresswell 1996), that led to hitherto unprecedented dialogue between the Rock's climbing community and its official stewards, Historic Environment Scotland (at the time operating under the name 'Historic

Scotland'). By providing an analysis of these events, valuable insights can be afforded to a broader consideration of heritage at Dumbarton Rock.

In May 2012, a groundswell of local anger was directed at Historic Scotland due to the persistent problems of graffiti, litter and perceived anti-social behaviour at the Rock's north-west area, which despite its separation from the castle itself, falls within the agency's ownership. Local discontent was articulated in an article published in *The Dumbarton Reporter* "Anger at castle's ghastly grounds", which reported on dissatisfaction from local MSP Jackie Baillie at low visitor numbers to Dumbarton Castle and targeted the poor condition of the northwest area as a sign of Historic Scotland's managerial complacency. The article included testimony from a local resident lamenting the poor condition of the Rock:

The monumental site dating from the 5th century has been turned into a graffiti-strewn wreck, littered with broken bottles, piles of rubbish and even human waste. Area residents have told how the once splendid visitor attraction has been turned into a "no-go area" plagued by antisocial louts, vandalism and mobs of under-age drinkers.

Jackie Baillie MSP said: "I am horrified to see one of Dumbarton's best landmarks being treated in this manner."

"I intend to contact Historic Scotland to ensure all graffiti and litter are cleaned as quickly as possible. I will also speak to Strathclyde Police to request additional patrols at the castle at night to deter youths from engaging in illegal activity. As the summer season approaches, Dumbarton Castle should be a hub of activity."

Dumbarton man, Campbell Yule, 64, who lives near the castle, told the Reporter: "It's ghastly. You wouldn't take a dog round there. There's evidence of drug use with burnt silver paper and there's camp fires and human waste. It's a haven for youngsters - I wouldn't go near it at night time and I would love to go get some photographs. It's not safe. Thursday, Friday, Saturday night, if it's a nice night it's total mayhem".⁵¹

Given the levels of concern reported in the local newspaper, Historic Scotland was compelled to act, taking steps intended to allow the removal of layers of graffiti that had accumulated at the Rock over the years. These developments sparked concern among the climbing community that the graffiti removal process could potentially damage the fabric and micro-features of the rock to the detriment of its many climbing routes and problems (see Figure 33). The Mountaineering Council of Scotland (MCofS - now Mountaineering Scotland), which with 11,000 members represents the interests of Scotland's climbing community,⁵² were contacted by local climbers and made aware of the graffiti removal plans. At this stage claims to propriety and a consequent right of consultation on any graffiti

removal plans emerged among the climbing community, requiring the 'mobilisation' of the Rock's somewhat 'invisible' climbing heritage. As Jones and Leech note, the alternative social values that heritage places generate outwith their official discourse may not be obvious in the fabric of a place to an 'outside' observer or "even be subject to overt expression within communities, remaining latent in daily practices and long-term associations with place, only crystallizing when threatened in some way" (2015: 6). We see the truth in Bender's statement then, that "there is no divide to be made, as archaeologists have so often done, between a ritual landscape and an everyday one" (2002: 108), with the Rock's climbing heritage bound-up in the quotidian performance of its climbing routes in a form of heritage landscaping. A useful reflection from the perspective of the climbing community appeared as a blog post written by John Watson, a long-term Dumbarton climber and guidebook publisher, dated July 4th 2012:

Whilst we may all have different views on how best to manage visual pollution such as graffiti - some would like to see it go, some feel it is part of the urban character of the place - the best we can do is represent our feelings on climbing heritage to the MCofS as our official climbing access representative.

My own personal statement in defence of climbing here remains:

- 1. We LIKE the place and USE it a lot, in all seasons, so naturally want to see a balance between conservation and the rights of our climbing heritage.
- 2. We clean the place up independently every year and ought to be recognised, or at least consulted, when decisions are being made on 'cleaning' the rock, which, from our point of view, is a delicate topic we treat the rock much more precisely than anyone e.g. sandblasting/and or chemical treatment could damage the rock and radically change the nature of many climbs.
- 3. This heritage is not notional climbers have brought decades of sport, social inclusion and personal development on a uniquely independent scale to Dumbarton and its population. Many people, young and old, have enjoyed the mental and physical benefits of rock-climbing at Dumbarton Rock. We also might cite the achievements of Dave MacLeod who began his career here arguably the world's best all-round climber.
- 4. Climbers are generally active conservationists and have the venue's long-term future at heart. If visual pollution by chalk is deemed a problem, we can change to eco-chalk, liquid chalk on hands, no loose chalk and police our own pollution. Climbers have also made significant efforts to counter their own erosion by using mats and gravelling out erosion channels.
- 5. Hundreds of climbers visit Dumbarton every year, FROM ALL OVER THE WORLD, as it is seen as a world-class crag thus bringing significant revenue to the town through transport, shops, petrol.⁵³

As Watson's statement itemised, the climbing community's long-term inhabitation, use, stewardship, and intimate knowledge of the Rock's fabric, provided the basis for cultural claims to a distinct sporting heritage and associated stakeholder rights at the north-west area. The climbing achievements of the Rock's very own son, Dave MacLeod, are also used by Watson to highlight its international repute as a distinct climbing venue. Based on these cultural claims, the MCofS asserted that some of the historic graffiti at Dumbarton Rock was in fact part of this climbing heritage. This graffiti, unlike the modern 'tag' style graffiti had been painted onto the boulders in the 1970s as social commentary. It gives voice to the political climate of Scottish Nationalism at the time, culminating in the Scottish devolution referendum of 1979. Located at a number of points across the boulders of the north-west area the graffiti consists of a painted Lion Rampant crest, text that reads 'Saor Alba/ Free Scotland' and 'Robert de Bruce' respectively (see Figure 33), as well as a painted statement on the steep face of the *Pongo* boulder:

IT WOULD BE AS EASY TO STOP THE ATLANTIC OCEAN AS TO STOP THE PRESENT AGITATION UNTIL JUSTICE HAS BEEN DONE TO THE PEOPLE. BAM BAM

This statement is a reference to the nineteenth century Skye crofter and "Glendale Martyr" John MacPherson, who was imprisoned for leading an uprising against the enforced clearances of the Glendale estate (Watson 2013: 12). The "BAM BAM" signature alludes to the reputed author of the Rock's historical nationalist graffiti, Tam "The Bam" McAuley, who was a regular climber at the Rock in the 1970s. Due to the long-term presence of the "bam bam" graffiti and its wider social meaning, it had become entwined in the Rock's textual climbing landscape, with the names of boulder problems such as *Home Rule*, and *Physical Graffiti* a cultural response to it. Indeed, the Eagle and Home Rule Boulders were so named in reference to the (now defunct) graffiti that adorned them (see Figure 34). As such, this historic graffiti was considered by the climbing community as a valuable component of the Rock's climbing heritage and thus worthy of preservation.

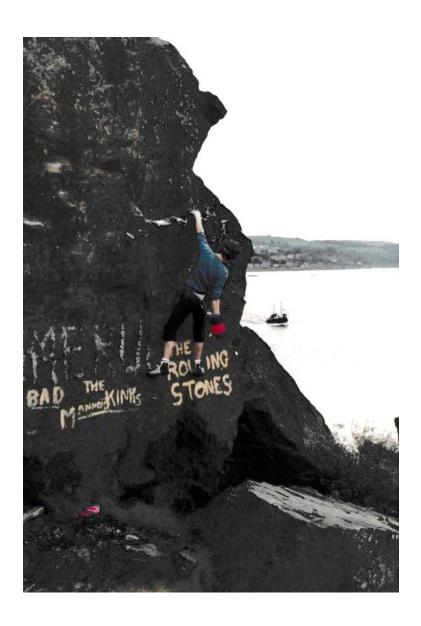


Figure 34: Dave 'Cubby' Cuthbertson climbing the boulder problem *Home Rule*, so named due to the Home Rule graffiti statement that once adorned it, visible in the picture (*Image: Gary Latter*)

Media interest grew in the brewing controversy at Dumbarton Rock. It was discussed on *The Jeremy Vine* show on BBC Radio 2,⁵⁴ and featured on The Scotsman⁵⁵ and BBC News websites. A BBC article dated 16th July 2012 is illustrative of the way in which the issue was framed and reported (Williams 2012). The article features a short radio report which is embedded alongside a textual summary of the 'debate'. In the radio report, the presenter visits Dumbarton Rock, describing its long historical narrative as a martial site and the colourful graffiti it has accumulated in recent decades. The main theme that runs through the article is the compelling contrast between the traditional historical narrative of the site as operated by Historic Scotland, and its more recent history as an important component of Scotland's climbing heritage. The fact that some of Dumbarton Rock's graffiti is reflective of its

climbing heritage, is used by the reporter as a motif to touch upon the inherently subjective nature of the historical process. A quote in the article from Dave Gibson of the MCofS, sets out their view succinctly:

The removal of the graffiti may well damage some of the very small, fine, holds that exist on the boulders and on the rock. And that's really important, because these climbs are world-class. There's one famous boulder here, called the Home Rule boulder, which has got historic associations for people wanting an independent Scotland. That, and other graffiti, have actually resulted in some of these climbs being named after the graffiti. Cave painting once was graffiti. Viking runes on the ancient monuments in Orkney were once graffiti. Napoleonic prisoners wrote graffiti on castle walls. So we would urge Historic Scotland to regard some of this graffiti - not all of it, but some of it - as being part of Scotland's climbing culture and heritage

With Historic Scotland broadly sympathetic to the cultural significance of historic graffiti (Forster et al 2012), after a consultation period with the MCofS to establish which examples of graffiti were to be preserved, all the graffiti deemed to be unrelated to the climbing heritage was sandblasted off the rock in March 2013 (with a representative of the climbing community present in an advisory role).⁵⁶ Despite the fact that the media representation of the graffiti issue at Dumbarton Rock portrayed a more contested situation than existed in reality, it provides a valuable record of the coincidental coming together of the Rock's dual heritage cultures into rare dialogue and discussion. Historic Scotland's willingness to engage with the climbing community and preserve the graffiti judged historically meaningful, is indicative of an institutional shift to better deal with "broader, more nuanced, complex and unsettling forms of heritage" (Hale et al 2017: 375) and wider trends in heritage practice towards the alternative meanings and social values that monuments accrue outwith their authorised heritage discourse (Jones 2016). Indeed, the consensus reached between Historic Scotland and the climbing community over the graffiti debate sits in stark contrast to issues over bolting in the 1990s, when climbers were labelled vandals. Ultimately, the critical questions thrown up by the Rock's 'graffiti-gate', led to a collaborative exchange between the Rock's climbing community and a site-specific project led by academic researchers. Entitled ACCORD (Archaeology Community Coproduction of Research Data), the project experimented with novel means of documenting the Rock's practice-based climbing heritage and social value, through the application of digital 3D technologies. The ACCORD project provides a valuable example in new, experimental ways of 'doing' heritage. In the section to follow I reflect on my participation in the ACCORD collaboration as a practitionerresearcher and the efficacy of its research outputs.

The ACCORD project

The ACCORD project§ worked with ten community groups across Scotland who had preexisting relationships to heritage places. The main aim of the project was to "examine the opportunities and implications of digital visualisation technologies for community heritage practice using co-design and co-production of 3D models of historic monuments", with a specific focus on the social values generated by these monuments independent of their 'official lives' as heritage places (Jones et al 2017: 5). The media interest generated by the contested removal of graffiti at the Rock had alerted members of the ACCORD project to the existence of the Rock's climbing community and its unconventional, "living heritage", leading to its inclusion in the project (Hale et al 2017).

The ACCORD project worked with seven climbers in total, recruited via two intermediaries (me being one of them) acting as conduits to the wider climbing community of the Rock. Utilising focus groups before and after the gathering of data, the ACCORD project worked with this group to co-design and co-produce a selection of digital records of the Rock's climbing heritage. Focused on the Rock's tangible material fabric, digital 3D models were created of specific boulders, climbs and rock faces, as well as the historic graffiti enmeshed in the climbing heritage. Due to their functionality for non-specialists and relative ease of use, photogrammetry (also known as Structure from Motion/SfM) and Reflectance Transformation Imaging (RTI) were the main recording methods utilised. Data was gathered over the course of four afternoon and evening sessions. Photogrammetry was utilised to record select boulders and lower rock faces, RTI for incised graffiti and time-of-flight laser scanning for the main north-west face, which was inaccessible for photogrammetry (Hale et al 2017).

_

[§] The ACCORD project was collaborative in design with researchers drawn from various disciplinary backgrounds and institutions. The project was led by archaeologist Alex Hale of RCAHMS (now HES), Sian Jones, Professor of Environmental History and Heritage at the University of Stirling, Stuart Jeffrey and Mhairi Maxwell of the Glasgow School of Art's Digital Design Studio and Cara Jones of Archaeology Scotland.

In effect, the ACCORD project sought to co-produce digital 3D objects in tandem with embedded heritage communities as a form of "counter-archaeology", which is better attuned to non-expert and situated knowledges than traditional research models (Hale et al 2017: 374). The Rock's community of practice and associated heritage was thus of particular interest to the ACCORD project as a prime example of the emergent and contemporary social values that heritage monuments can generate outwith their official heritage discourse, and the potential for counter-archaeological methods to express these alternative values. Jones defines social values with regards to the historic environment as "fluid, culturally specific forms of value embedded in experience and practice. Some may align with official, state-sponsored ways of valuing the historic environment, but many aspects of social value are created through unofficial and informal modes of engagement" (2016:2). Experimental approaches in heritage practice such as the ACCORD project seek to better account for such intangible social values, and are a response to traditional, expert-driven modes of heritage conservation and management that "tend to focus on historic and scientific values, and consequently often fail to capture the dynamic, iterative and embodied nature of people's relationships with the historic environment in the present" (Jones 2016: 2).

The conceptual focus of the ACCORD project on "social value" as shorthand for the emergent, embodied and often intangible properties of heritage sites proved synergistic to the ongoing, living heritage of the Rock's climbing landscape and its basis in quotidian performance and practice as a form of heritage landscaping. Indeed, the co-production of digital 3D models of resonant aspects of the Rock's climbing landscape provided a tangible counter-archaeological record of an otherwise largely performative heritage; in effect, a shareable digital proxy for the situated, material 'heritage-fabric' of its boulders, rock faces and graffiti. This digital record or 'fabricated landscape' was created by various means. Interactive 3D models of the Sea Boulder (see Figure 35) and the Pongo Boulder were created using photogrammetry, both of which feature examples of the Rock's associated historic graffiti.⁵⁷ RTI was utilised to capture a variety of the Rock's largely invisible inscribed graffiti, as opposed to that of its surface-level spray painted graffiti. RTI allows the user to manipulate a directional light source over a high-resolution photograph of an inscribed surface, with the variable direction of light bringing otherwise hard to distinguish inscriptions into visual relief. In contrast to this close focus, laser scanning was conducted at various points to create a distanced, digital facsimile of the Rock's main north-west face and boulders below – in effect, the entire site, scene and backdrop of its performative

climbing community. Lastly, a miniature 3D model of the Eagle Boulder was produced using a 3D printer. In keeping with the notion of the Rock's climbing landscape as a 'creative commons', all the digital files relating to the above outputs, as well as other material relating to the Rock's climbing heritage have since been archived on the Archaeology Data Service website.⁵⁸ All the digital files can be downloaded, though some objects such as the full laser scan require more specialist software, computing power and the requisite knowledge to utilise.



Figure 35: Image of 3D model of the Sea Boulder created with photogrammetry. Note the historic 1970s 'Free Scotland/Saor Alba' graffiti (*Image: ACCORD Project*)

As an increasingly utilised method in heritage practice, the digital recording and fabrication of historic objects raises interesting questions regarding the negotiation of materiality and authenticity around digital facsimiles, due to the "weirdness of the digital world in comparison to everyday experience" (Jeffrey 2015: 144). With regards to the ACCORD project however, the interest lay in "the wider work that such objects do in respect to the cultural politics of ownership, attachment, place-making and regeneration" in the context of community co-production (Jones et al 2017). On completion, the digital 3D models of the

Rock's boulders were provocative in the way they captured the three-dimensional qualities of its embodied climbing landscape, as opposed to the two-dimensional plane of photography. Being able to rotate, zoom-in and manipulate one's perspective on individual boulders cast them in a new light; their digital separation from the wider context of the landscape in which they sit, casting them as individual, historic monuments. Such reflections on the Rock's digitisation are noted by Jones et al:

...for one of the climbers we worked with at Dumbarton Rock the 3D models of the boulders and rock faces allowed him 'to experience the place differently'. Indeed despite the absence of materiality, the climbers' response to the digital models was informed by their embodied practices, and the value of the models in part lay in the way they allowed them to think through the relation between their bodies and the surfaces of the rock in new ways (2017: 13).

Though some way off in terms of technological practicalities, the photo-realism and manipulability of the 3D models also generated speculative discussion on the role that the digital technologies employed in the ACCORD project may play in producing interactive 3D guidebooks of the future, with the lines of climbing routes and grades super-imposed upon 3D models of boulders and rock faces, as well as additional tabs to access the associated history of a chosen route. Though the miniature 3D print of the Eagle Boulder was generally considered to be too 'plasticy' and vivid in colour palette to be considered as an authentic record (in part due to its unnaturally bright-orange rendering), the future potential of the technology was playfully imagined whereby full-scale artificial boulders may be 3D printed, with reference made to the hand-sculpted concrete boulders of the Cuningar Loop Bouldering Park in the East End of Glasgow, designed to mimic the sandstone rock architecture of Fontainebleau, France (Hale et al 2017: 383).

Though the digital 3D models created during the ACCORD project were compelling representations of the Rock's associated climbing heritage, it was the process of co-production (between climbers, academics and heritage professionals) as opposed to the digital outputs themselves that led to wider outcomes in amplifying the voice of the climbing community as legitimate stakeholders in the Rock's ongoing heritage life. To elaborate, the collaborative process of the ACCORD project helped to address the marginalisation of the Rock's climbing heritage in the face of its official heritage discourse over the previous decades, by rendering its living heritage more clearly visible. Rather than the digital archive itself being the end product, the 3D scanning helped cement the 'monumental' status of the actual geology to the climbing community's perception of place, providing a counter-

archaeological record and a political hook on which to hang claims of stewardship and formal recognition; as in the case of the community's assertive participation in decision making over Historic Scotland's program of graffiti removal in 2012-13. As Hale *et al* reflect:

Collaborative 3D recording and modelling as a form of counter-archaeology has resulted in a shift from authorized heritage to marginalized heritage at Dumby. This has also challenged the prioritization of product over process. It reveals that it is not just the resulting records but importantly also the act of recording as a form of co-production which allows marginalized forms of heritage to be foregrounded and negotiated. The climbing community have always valued their physical and performative engagement with the site, understanding and experiencing its heritage through the process of finding, following or creating routes up the rock. The process of digital recording offered yet another mode of engagement with the heritage of the site. In this case, it was a process that ultimately led to a broader recognition within the heritage domain of the site's climbing history and a validation of its importance (2017: 384).

Moreover, the collaborative nature of the ACCORD project led to the addition of a 750word description of the Rock's climbing community and heritage being added to Historic Environment Scotland's Official Statement of Significance for Dumbarton Rock, ⁵⁹ meeting the climbing community's desire for the formal recognition of the Rock's more recent sporting heritage alongside its traditional narrative as an Ancient Scheduled Monument. Furthermore, a co-authored paper in World Archaeology (Hale et al 2017) describing the work of the ACCORD project at Dumbarton Rock was a means to expose its unconventional heritage to a wider audience, securing its legitimacy as a heritage site worthy of academic interest. In a broader context, the synergies between the ACCORD project's focus on the intangible social values of heritage places and the dynamic, heritage landscaping of the Rock can also be attributed to the processual turn which has characterised both landscape and heritage studies in recent years (Harvey 2015). The processual nature of the Rock's climbing landscape and associated heritage thus required a novel form of landscape and heritage enquiry such as the ACCORD project which ultimately led to a wider recognition of the Rock's sporting heritage alongside its authorized heritage discourse. The ability for the climbing community to draw upon such tangible 'evidence' of an otherwise "invisible archaeology" (Hale et al 2017) may prove important in potential future debates over the Rock's future, particularly as objectively scientific surveys have a tendency to take priority over 'spiritual' ones in a development context (Jones 2016: 4).

Performative intervention: lighting lines at Dumbarton Rock

As the ACCORD project activities illustrate, experimental and creative methodologies offer a means of grappling with the more intangible qualities of the historic environment, often overlooked in traditional forms of heritage practice geared towards the conservation of buildings and objects (Jones 2016). Inspired by these possibilities, I set out to design and conduct my own creative intervention as an experimental means of evoking the ongoing heritage landscaping of the Rock via the practice of climbing.

Though the Rock's climbing heritage is tangible in its rock faces and boulders, as well as the textual representations of guidebooks, its essence is in the ongoing reproduction and performance of its climbing routes. As Hale *et al* state: "This is a form of heritage that is strongly grounded in practice and performance, the actions of bouldering and climbing at Dumbarton Rock bringing into focus the associated history of aggregated practice over the past fifty years or so" (2017: 380). In this sense, the embodied act of climbing at Dumbarton Rock is a form of heritage landscaping in which geography and memory become enmeshed, and through which, "space becomes a weave of the textual and material and an enduring repository of numerous layers of connected meanings, past and present" (Gilchrist 2012: 1385). To animate this dialogic relationship between cultural meaning and place, imaginative geographies are required; prompting an epistemological shift beyond visual and textual readings of landscape "to a relational construction in which embodied practice becomes a source of meaning, and those meanings emerge through contact with the material surface and cultural memories" (Gilchrist 2012: 1385).

With regards to evoking landscape as relational and embodied, performative methodologies are of great utility, drawing attention to the phenomenological basis of lived landscapes such as Dumbarton Rock (Rogers 2012). One of the key proponents and practitioners of 'landscape as performance', Mike Pearson (2012: 7), outlines its utility as a mode of geographical praxis and landscape exposition, that can "illuminate the historically and culturally diverse ways in which a particular landscape has been made, used, reused, and interpreted; and help make sense of the multiplicity of meanings that resonate from it".

With Pearson's appeal for creative interventions in mind, I set out to utilise performance to "make legible" the Rock's embodied climbing landscape and its intangible heritage, or

"invisible archaeology" (Hale *et al* 2017). To achieve this, I 'performed' a selection of the Rock's boulder problems at night, in darkness, while wearing a light suit, with my kinaesthetic movements captured by long-exposure photography. Though not a performance in the mode of Pearson's 'live' site-specific work with an engaged audience, my own creative praxis stemmed from the performance of climbing routes (or embodied knowledge) to produce specific aesthetic effects.

My choice to utilise light (and its absence) to illuminate the Rock's climbing landscape was informed in various ways. Artistic and aesthetic inspiration was drawn largely from the work of the public arts organisation NVA, which has staged various events where moving bodies, light and landscape have been used to dramatic and provocative effect. NVA's participatory open-air artwork *Speed of Light* on the city landmark of Arthur's Seat in Edinburgh in 2012 showcased the 'mass affect' that such creative interventions in landscape can generate, as well as their geographical scholarly relevance to "recent disciplinary thinking about landscape-as-milieu, where experience, encounter, sensation, perception, atmosphere and affect are fields of intellectual inquiry and artistic experiment" (Edensor and Lorimer 2015). In an earlier project from 2005 entitled *The Storr: Unfolding Landscape*, NVA illuminated the iconic rock pinnacles of The Old Man of Storr in Skye, illustrating the manner in which staged light and sound can augment the natural dramaturgy of a physical landscape and its cardinal features.60 I had also experienced the affective qualities of NVA's work at firsthand, as a participant in the company's critically acclaimed *Hinterland* event in 2015, when the iconic modern ruin of St Peter's Seminary in Cardross was dramatically reanimated through the projection of light, sound and theatrical performance.⁶¹ Although my own creative illumination of Dumbarton Rock was much more modestly scaled than these seminal productions, the creative and dramatic combination of light, darkness and movement to 'abstract landscape' was comparable. My hope that a small-scale creative intervention in landscape could produce dramatic results was also bolstered by the work of Jaramillo (2016), in a project which utilised nothing more than an assembly of headtorches aimed skyward, to draw attention to the subterranean "hidden labour landscapes" and heritage of the former lead mines of Bonsall Moor in the Peak District National Park.



Figure 36: The practice of night bouldering with headtorches and spotlights at Dumbarton Rock (*Image: Jonathan Bean*)

As well as these arts and academic projects, there were also more site-specific considerations that inspired my own experimentation with light and landscape. The practice of 'night bouldering' is common enough at the Rock where spotlights and headtorches are used by climbers to allow climbing in the long-dark of the winter months when cold temperatures are conducive to good friction. Photography of such sessions naturally creates abstract and artistic results (Figure 36). As such, I was aware that a full 'light-suit' as opposed to a single headtorch would be visually striking, capturing the kinaesthetic movements of the climbing body.

While resonating with the situated practice of night bouldering, there was also a conceptual dimension to my creative intervention. In effect, my intention was to use light and movement to evoke the more-than-representational aspects of the Rock's climbing landscape and concomitant heritage. To elaborate, climbing movement can be considered as an embodied act which 'lights up' and animates the otherwise static medium of the rock (while fully acknowledging the influence of the rock on the climber's movement and its own post-phenomenological 'agency'). This dialogue between climber and rock is visible in traces at

Dumbarton Rock, with the bright white of climber's chalk marks standing out clearly from the Rock's dark basalt. Between the contact of fleeting human bodies and rock, sparks of culture fly, a physical graffiti that though temporary, leaves a trace, like impressed light trails that appear on the retinas of closed eyes. With countless hands grappling the same holds, and innumerable bodies moving in similar but ultimately individual ways – a catalogue of movements coalesce around a climb, like a spectral archive lending it character and consciousness. As Drasdo writes:

It might be claimed that cliffs and mountains are facades without shape or dimension until they are floodlit by human effort...the climbers touch brings the cliff to life...Climbs interpret mountain faces. A climb is the most human relationship possible with a mountain face. Climbs amplify the persona of a mountain. The more effort has been expended, the more increment to the mountain's character (Drasdo 1978: 457-8 in Lewis 2000: 78).

As well as illuminating the "hyper-inscribed" (Gilchrist 2012) nature of the Rock's "invisible archaeology" (Hale *et al* 2017), my performative intervention was also intended as a means of 'lighting-up' and drawing aesthetic attention to the value of its associated heritage (as in the case of the ACCORD project), which until recently had been marginal to the Rock's official narrative as an Ancient Scheduled Monument. Despite this liminal status, the Rock's climbing culture is vital and animating and should be considered as a continuation of a remarkable place history of human-environmental interaction, stretching back across 1,500 years of recorded history.

There also exists a wider 'politics of light' at the Rock, which can be related to my own 'guerrilla lighting' of its climbing landscape. To elaborate, despite the prominent physical and cultural presence of the Rock to the town of Dumbarton, it has not been illuminated as a civic focal point since the 1990s, due to a lack of public funds. Re-illumination of the Rock was championed by local councillor Geoff Calvert in 2008 but allocated funds were instead directed towards the regeneration of the town centre. Mr Calvert's feelings were reported in *The Dumbarton Reporter:* "I am quite disappointed with the low aspiration and vision that has been expressed. It sends a very sad signal to the communities of West Dunbartonshire". Furthermore, in 2015, a design charette was undertaken by West Dunbartonshire Council to consult the local community and various stakeholders as to how to improve the environment of the Rock as a heritage and recreational asset to the town. Despite re-illumination of the Rock being agreed as a priority, it remains, in every sense, very much in the dark. With this in mind, my guerrilla lighting of the Rock's climbing landscape can be considered as a

creative response to this inertia, representing how climbing movement lights-up and adds social value to the Rock's north-west area.

Doing

I conducted my performative intervention over the course of two evenings in Autumn 2018. I utilised two separate light-suits, which were loaned to me by arrangement with NVA. These were the same light-suits utilised in the company's *Speed of Light* event. The suit design features a series of LED lights located on the arms and legs to illuminate the human form and movements of the wearer, with a battery and control pack secured at the waist. The LEDs on one of the suits were programmed to project a constant white light, while the other phased between red, yellow, orange, blue and green. I worked collaboratively with two separate photographers on each occasion, Chris Houston and Ryan McHenry, both of whom are also climbers and regular users of the Rock. Due to practical limitations, all of the climbs photographed were boulder problems as opposed to the main face climbs, with damp conditions during the first session posing further practical challenges.

Due to the design of the light-suit around a lightweight flexible exoskeleton, it allows relatively unhindered climbing movement, though the battery pack housed on the waist belt adds extra weight to the usually unencumbered practice of bouldering. Climbing in the darkness of night with the rock illuminated by the proximity of my moving, climbing body proved an interesting and novel experience, with deeply familiar problems and holds appearing unfamiliar due to the shifting play of shadow and light upon the rock. Indeed, at points, my embodied knowledge and spatial memory of the climbs performed came to the fore, as their visual appearance became unfamiliar due to the vagaries of the shifting light cast upon them. Knowing, exactly where certain holds were located allowed me to reach for them with confidence, despite their visual distortion. The need to climb quickly to complete the full line of a given boulder problem within the short exposure window placed another demand on my memory-bank of kinaesthetic knowledge. Indeed, climbing in this state of slight myopic confusion, reaffirmed the primary role of touch as the basis of embodied climbing knowledge (Lewis 2000); although the holds may appear different, their dimension and position in space remains the same. As well as photographs that captured the light-trails of particular boulder problems and pathways between the boulders, spotlights and

headtorches were used to up-light particular boulders or historic graffiti in the manner that conventional monuments and historic buildings are illuminated as focal points of civic life.

Results: landscapism

The photographs of my creative experimentation with light and dark evoke the fleeting movement of the Rock's climbing landscape. The lines of the individual boulder problems are prominent, their inscription upon the landscape clear. As opposed to the single line of guidebook topos however, the line of light trails captured is messy due to the movement and adjustments of the climbing body across the individual handholds and footholds that compose the climb. Whereas the textual landscape of the Rock is composed of concise lines, grades and description, its corporeal reality is messier, improvised and emergent – a physical graffiti. In this focused aesthetic attention on the movement of the climbing body, we see the manner in which the climbing of routes lights-up and animates the medium of the Rock. It is a reciprocal exchange though, with the obdurate, enduring geology of the Rock exerting its own agency upon the movement of the climbing body - the north-west face appearing as if an open-book, containing the entire narrative of the intense and sustained exchange between people and place that defines its climbing heritage.

In the first sequence of photographs (see Figures 37-42), the darkness of the Rock appears to emanate an internal glow, as the ambient light cast from the town is reflected from its walls. It is far from homogenous in colour and texture, appearing as if tiger-striped with vertical bands of darker rock apparent. Dapples of lichen and moss also lend texture, accumulating on those parts less travelled by climbing bodies, particularly during the wetness of autumn and winter. The brilliant white light cast by the light-suit is colder, elemental, as if drawn from the starlight above. The rock reflects back a deep purplish hue, its facets and form distorted by the moving light around it. The body itself – my body – is rendered invisible by the intensity of the light shining from it, lending the scene an uncanny quality - a will-o'-the-wisp caught in motion by the photographic lens. Indeed, it is the augmented vision of the photographic lens that allows this composition of light and motion to emerge. It is not a scene available to the naked eye. In this sense, the dramatic staging of the Rock's climbs in this manner allow us to go beyond the everyday, quotidian experience of its landscape and its standard photographic representation in guidebooks to reflect on its deeper qualities.

The second sequence of photographs (see Figures 43-50) were captured on a warm evening in late April, with lengthening daylight hours resulting in a 'warmer' feel to the photographs. Shot from a vantage point looking west and focused on the iconic Home Rule and Eagle Boulders, in these images, the wider landscape features more prominently, the orderly urban lighting of Port Glasgow and Dumbarton contrasting with the messy light-trails of the climbing body and the remaining sunlight of the western horizon. We see too the waters of the River Leven and Clyde, reflecting the light of the skies above and softening the hard materiality of the Rock's dense basalt. Two prominent faces of the Home Rule boulder are floodlit, akin to the dramatic under-lighting of historical buildings, their micro geographies and features evident in shadows cast. Without the humanising element of the climbing body, they appear monolithic and monumental, born of deep time and witnesses to the recent, shifting milieu of human life around them.



Figure 37: Friar's Mantle, Neil MacNiven, 1963 (Image: Chris Houston)



Figure 38: Walking the well-trodden pathway between boulders (*Image: Chris Houston*)



Figure 39: Impostor Arete, Neil MacNiven, 1963 (Image: Chris Houston)



Figure 40: Hard Cheddar, Neil MacNiven, 1963 (Image: Chris Houston)



Figure 41: The iconic face and historic graffiti of the *Pongo* boulder (*Image: Chris Houston*)



Figure 42: The looming and luminous north-west face (Image: Chris Houston)



Figure 43: Home Rule, the River Clyde and the lights of Port Glasgow (Image: Ry McHenry)



Figure 44: Home Rule in thickening darkness (Image: Ry McHenry)



Figure 45: The Blue Meanie, 1970s. Ben Lomond dominates the horizon (Image: Ry McHenry)



Figure 46: The well-worn descent from the Eagle Boulder (*Image: Ry McHenry*)



Figure 47: Sucker's Boulder (Image: Ry McHenry)

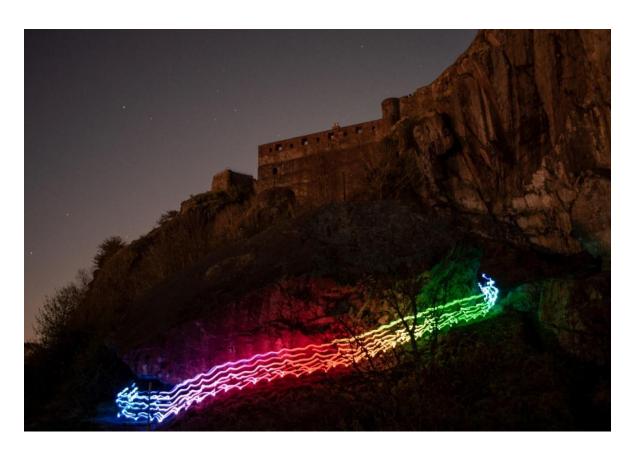


Figure 48: The Eagle Boulder wrapped in a rainbow of light. The castle walls above (Image: Ry McHenry)

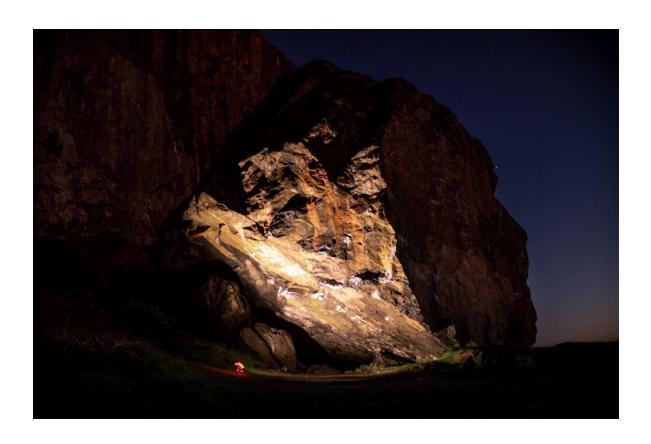


Figure 49: The Mugsy face lit as a historic monument (Image: Ry McHenry)



Figure 50: The Home Rule face lit as a historic monument (Image: Ry McHenry)

Conclusion

In the context of popular conventions of Scottish landscape and heritage, Dumbarton Rock is a unique and unconventional site. Its gritty, semi-urban climbing landscape is one far removed from the ostensibly wild and remote cultural hearth of the Scottish Highlands. Instead, it is one aligned with post-industrial decline and the urban realities of much of Scotland's population. These exurban qualities however, lend it a compelling vibrancy and value. Its climbing landscape is a highly embodied one, born of an intense and sustained exchange between people and place; illuminating the need to go beyond representation in our bid to apprehend and understand the heritage values generated through this exchange.

In this chapter, I have sought to tell the "small story" (Lorimer 2003) of Dumbarton Rock as one among many in the emergent aesthetics of the New Scottish Landscape, in which an increasingly processual approach to landscape and heritage finds salience and expression. In an attempt to marshal various aspects of the Rock's substantial and enduring presence, the telling of its story has been episodic in nature, ranging across geological, historical and personal timescales. In detailing the longer historical geography of the Rock's development as a climbing destination, I have sought to contextualise its ongoing performance as a process of heritage landscaping, in which the past is ever present.

At the heart of this process of heritage landscaping is the Rock's textual and embodied climbing landscape, which emerge as a contingent practice. That is, while the Rock's abstraction as 'text' is drawn directly from the embodied act of climbing and aggregated past-practice, its hyper-inscribed textual nature informs and inflects the ongoing conduct of climbers at the Rock. While drawing upon performative theories of landscape to provide a solid conceptual basis for the embodied nature of the Rock's climbing landscape, I also sought to turn a performative ethos into practice by utilising creative and experimental photography as a means of 'capturing' the process of heritage landscaping by which the Rock's climbing community generates, and indeed, 'curates', its meaning as a distinct and dearly held climbing destination.

Just as the Rock's climbing landscape is 'unconventional', so too is its associated heritage, which emerges in the ongoing (and somewhat incidental) heritage landscaping of its climbing community. The largely intangible nature of this living heritage is made even more

pronounced in comparison to the more conventional heritage of the castle above, based upon the ongoing preservation of its extant fabric. This is not to suggest that the Rock's climbing heritage is somehow 'better' than that of the castle above, but rather that, it too, is worthy of consideration and care. As heritage practice becomes increasingly "democratised" (Jeffrey 2015), and more attuned to the primary role of practice and experience in the formation of social values held by 'unofficial' heritage communities, the Rock's climbing heritage provides an instructive example of the richness and depth of meaning to be found in such values (Jones 2016). The success of the ACCORD project in gaining official recognition of the Rock's cultural significance as a climbing destination alongside its traditional narrative, illustrates the potential for such novel forms of heritage practice to help 'activate' otherwise latent or marginalised heritage, as well as the increasing willingness for organisations such as HES to engage with the alternative meanings generated by the monuments in their care. In the context of uncertain future land-use developments around the Rock, where despite political commitments to recreation and amenity, new housing developments creep ever closer, it is important that new ways are found to translate and promote the value of the Rock's unique climbing landscape and associated heritage. As Macfarlane states: "It is true that once a landscape goes undescribed and therefore unregarded, it becomes more vulnerable to unwise use or improper action" (2016: 14). Indeed, recent bans imposed on several world-renowned rock climbing areas in the Grampians national park in Victoria, Australia, highlights the importance of being able to 'evidence' the value of climbing heritage when drawn into conflict with other stakeholders.⁶⁴

In this sense, the fact that the Rock's climbing area is contained within the boundaries of an Ancient Scheduled Monument offers it a substantial degree of protection, and as such, it is important that a positive and mutually respectful relationship with HES is maintained. As the 1994 edition of *Lowland Outcrops* notes, "remember that climbing here is a privilege, not a right" (1994: 26). Despite this statutory protection, it remains important that new and experimental ways of apprehending the more intangible aspects of landscape experience and the social value of heritage sites are pursued. In its sustained and holistic approach to the landscape concept and its tendency to act as bridging point between various academic disciplines, cultural geography can contribute much to this endeavour. The success of the ACCORD project in achieving a current (and ongoing) recognition of the Rock's climbing heritage within its official designation illustrates the efficacy of such novel and collaborative approaches in not only valuing heritage sites due to their historical narratives but also their

future potentialities. As Dave MacLeod wrote in 2007, reflecting on the end of his sustained and prolific ten-year tenure at the Rock, in which he pushed Scottish rock climbing to world class standards:

Sometime I'd also love to see everyone who lives in Dumbarton (if not Scotland) know about the value of the cliff and boulders there. The castle on top of the volcano is Dumbarton's wee claim tae fame. But that will always be something that was only important in the past – the climbing is important in the past, present and future, which is much more valuable. 65

5. Mapa Szkocji - The Great Polish Map of Scotland



Figure 51: The Great Polish Map of Scotland in the grounds of the Barony Castle Hotel (*Image: Craig Allardyce*)

Introduction

In the grounds of the Barony Castle Hotel, near the small village of Eddlestone in the Scottish Borders sits a compelling feature in the Scottish landscape – 'The Great Polish Map of Scotland'. Measuring 50 metres by 40 metres, 'the Map' is in fact a 1:10,000 scale, 3D terrain relief model of the Scottish Mainland and Western Isles composed of sculpted concrete. Set within a 1.5m deep oval pool, the Map is surrounded by water to replicate the

maritime outline of the nation at large (see Figure 51). Although a remarkable cartographic object in its own right (claimed to be the largest outdoor relief model in the world),⁶⁶ the Map is lent further potency by its compelling folk-history and its genesis, not in the mind of a Scottish patron, but that of a Pole and native of Krakow, Jan Tomasik.

The story of the Map is one ranging across time and space, from bustling pre-war Krakow to the here-and-now, a quiet, pastoral setting in the Scottish Borders. Like most good stories, it contains distinct episodes with a tempting narrative arc. Compellingly, one of the longest episodes of the Map's life thus far has been one of ruination, as almost immediately after its construction between 1974-1979 by a small group of Polish geographer-cartographers, the Map began an inexorable slide into obscurity and disrepair, its landforms shattered by weathering and erosion just as surely as its folk-story was eroded from local memory. For approximately three decades the Map lay largely forgotten under a blanket of colonising plants and mosses, until a serendipitous encounter brought it back into relief in the mid-1990s.

This rediscovery led to the gradual piecing together of its story across the proceeding decade, with many of the local myths about the Map debunked in the process. In 2012, the Map was duly recognised by Historic Environment Scotland as a Category B Listed Building, and in 2014 a formal charitable campaign to restore the map was undertaken by 'Mapa Scotland', champions for its cause. After the recent culmination of the Map's recovery, it now provides a site and symbol for the remembrance and performance of long-standing cultural ties between Scotland and Poland. The Great Polish Map of Scotland is then more than *just* a relief map, but also exists variously as a reclaimed ruin, sculptural land art, historical monument and cultural symbol for Scotlish and Polish identities. In its 'ground-up' reinvention from ruin to relic, and its poly-vocal, hybrid symbolism we can consider the Map as a "small story" (Lorimer 2003), in the emerging aesthetics of a New Scottish Landscape.

As well as the obvious geographical appeal of the Map as a physical object and the handson processes of abstraction, modelling and making that went into its construction and restoration, the wider cultural contours of the Map and its compelling story allow wider consideration of critical questions and debates concerning the nature of landscape, heritage and nationhood. Like any historical object, the Map's present meaning and cultural resonance is drawn from the stories that are told around it. As such, this chapter is structured in a manner reflecting this popular narrative through a series of notable episodes in the Map's life - of inception, construction, ruination, re-discovery and restoration. As well as providing the cultural narrative behind the Map's present-day configuration, each episode of the Map's life will be considered through various conceptual lenses to reach out to wider theoretical debates concerning the nature of landscape and heritage.

In effect, the Map is an intermeshing of landscape and heritage in one object, and as such, it provides a useful case study for considering the conceptual synergies between the two noted by Harvey, which are increasingly approached in academia, policy and practice as cultural processes (as "becomings"), as well as bounded objects (Harvey 2015: 912). The Map's transition from neglected ruin to become a recently enshrined heritage object is instructive as an example of "heritagisation" – a term which describes the cultural processes through which the value of particular material objects-as-heritage are recognised (Klekot 2012: 460). While I describe the physical restoration of the Map, I also consider the wider cultural process of "heritagisation" which resulted in financial support and official advocacy for its 'new status' as a valued historic object. The ground-up genesis of the Map's recovery and restoration will also be related to the increasing recognition of the role of 'un-official' heritage communities in heritage practice (Waterton & Smith 2010), as well as the emergent social values that historic monuments generate outwith their official designations through a process of heritage landscaping (Jones 2016).

The Map also provides a useful means of considering the multi-faceted nature of landscape and the various registers it operates across. To elaborate, much of the potency of the Map as a historic monument and cultural symbol is due to its evocation of the Scottish landscape, which — via a 5:1 altitudinal exaggeration — is presented as one that is essentially mountainous and rugged. Indeed, as we shall see, it was a love of landscape that initiated the restoration of the Map by a small group of landscape enthusiasts in the first instance. Furthermore, the Map's representational landscape qualities (which in effect, present the observer with the Scottish nation in miniature), have been central in gaining official advocacy for the map by the Scottish Parliament, with its concrete landscape providing a useful proxy and backdrop for the promotion of Scotland as a cosmopolitan, European nation. As Macleod states, "questions of landscape, culture and identity are closely intertwined with the official institutional expression of nations and states" (2002: 54).

The Map's visual, representational qualities of landscape are also central to its function as a historic monument and popular visitor attraction, as evidenced by its associated TripAdvisor page and the intensely scopic responses of individuals.⁶⁷ Indeed, when featured in various media forms, the Map is more often than not represented from the distanced, cartographic view from above as something to be observed, apprehended and surveyed as a whole.⁶⁸ Despite the popular visual appeal of the Map and its resonance with Western cartographic conventions (Harley 1996), I contend that it also speaks to more recent approaches to landscape that foreground its emergent, processual and phenomenological qualities. As mentioned, the initial motivation to restore the Map was engendered by the topophilia of a small group of landscape enthusiasts and fell-runners, whose knowledge of the Scottish landscape was gained via embodied practice. Furthermore, based on my own situated experience of labouring on the Map's restoration I argue that the recovery of the Map itself can be considered as an act of heritage landscaping, both literally and figuratively, where, rather than the distanced view of the Map's popular representation and visitor experience, it became a proximate material milieu of engagement and a "taskscape" (Ingold 2000). That is, the practical activities of dwelling and the rhythms of working on the Map became the primary means through which the wider landscape in which the Map sits was experienced. Due to the resonance of the Map in both the inter-related fields of landscape and heritage then, it is a useful means for exploring both concepts and the manner in which they can inform and enrich one another at the conceptual level, as well as in policy and practice (Harvey 2015).

The Map's inception, construction, ruination and rediscovery are of the past and my telling of these stages of the Map's life will be based largely on archival material and individual testimony, while its recent restoration, present, and future are of contemporary concern and within my own realm of hands-on experience as a member of the restoration team. In Part I of this chapter, the telling of the Map's past is one in which it is more distanced in both time and perspective, akin to the bird's eye view of cartography and the archival work of historical geography, while its present telling in Part II, is far more proximate, up-close and tactile based on my own material encounter with the Map as a landscape within a landscape. It is my hope that this distanced, and proximate, consideration of the Map will effectively convey its compelling cultural and material qualities, and the manner in which it operates at varying scales of geographical enquiry across time and space.

Part I: Origins

Inception



Figure 52: Jan Tomasik (left) on a building site in Krakow, 1939 (Image: Mapa Scotland)

In this recounting of the Map's story, I build upon its 'popular history' as rehearsed and retold at the Map itself (via interpretation panels and leaflets), the Mapa Scotland website,⁶⁹ and the many media articles to have been published regarding its restoration campaign.⁷⁰ The (re)construction of the Map's popular narrative is thanks to the work of Roger Kelly, David Cameron and the late Kim Traynor of Mapa Scotland, who through a "make do and mend" approach (Lorimer 2010), pieced together the personal histories behind its genesis.

To trace the origins of the Map's inception, it is necessary to cast back to pre-war Poland and Krakow native Jan Tomasik, a construction manager by trade (see Figure 52). At the onset of war, Tomasik was one of the many thousands of Poles to answer the call to arms and the defence of the nation. After the invasion of Poland on the 1st September 1939 by

Nazi Germany and the Soviet Union, and the subsequent fall of mainland Europe to the Nazi forces in May 1940, Tomasik was one of approximately 17,000 Polish Troops evacuated to Scotland from the ports of western France. Housed temporarily in camps around Crawford, Douglas, Biggar and Peebles, before establishing more permanent bases north of the Forth in Fife, Angus and Perthshire, Polish troops in Scotland were initially tasked with the strategic defence of the eastern seaboard against possible Nazi invasion and the installation of coastal defences (Carswell 2011). As the Allied requirement for front-line troops increased, in May 1942, 15,000 Polish troops, including Jan Tomasik, were drawn away from defensive duties and subsequently reorganised into the 1st Polish Armoured Division under the leadership of the esteemed tank commander, General Stanislaw Maczek (See Figure 53).



Figure 53: General Stanislaw Maczek and the 1st Polish Armoured Division (Image: Polish Scottish Heritage)

In September of the same year, the 'Hotel Black Barony' (now Barony Castle Hotel), which had operated as a hotel since 1930, was requisitioned to function as the Polish Armed Forces Higher Military School, for the advanced training of Polish officers. It is at this point then, that the 'Polish connection' at Black Barony was first established, with the hotel performing its wartime function until 1945, with General Maczek himself attending a closing ceremony of one of the staff courses in April 1943. There is also speculation that during this time, a large-scale map of Scotland was created in the grounds of the hotel to aid in strategic planning, though no tangible evidence of its existence remains.⁷¹

The men of the 1st Polish Armoured Division were relocated to the Scottish Borders, with Polish troops becoming a common sight in the Border towns of Galashiels, Kelso, Earlston, Lauder, Greenlaw, and Duns. Jan Tomasik was among these men, and after a budding romance with a Scottish nurse, Catherine Kimlin (who treated him for a wound at the Peel Hospital in Galashiels), the couple were married in September of 1942 (see Figure 54). In July 1943 the 1st Polish Armoured Division were relocated to England for further training prior to the Normandy Landings, where under the experienced command of General Maczek, they played a key role in the Battle of Falaise Gap in August 1944 and the Liberation of Breda in the Netherlands in October of the same year.



Figure 54: Catherine Kimlin and Jan Tomasik on their wedding day, September 1942. Note the 'Winged Hussar' insignia of the 1st Polish Armoured Division on Tomasik's uniform (*Image: Mapa Scotland*)

After the war ended, approximately 7,000 Polish ex-servicemen opted to remain in Scotland rather than return to the political uncertainties of a Soviet Union controlled Poland. In light of his marriage to Catherine Kimlin, Tomasik was one of those who chose to remain to build a new life in his newly adopted country. To do so required determination and hard work,

particularly as former Polish servicemen such as Tomasik were provided no financial assistance or military pension from the British government due to their technical status as foreign nationals. However, doubtless steeled by his wartime experiences to take risks, and with an appetite for logistics learned from his pre-war work as a construction manager and his role as a quartermaster during the war, Tomasik became a successful Edinburgh hotelier, owning and operating the Learmonth Hotel in the city's West End.

Due to difficult personal circumstances Tomasik's former wartime commander, General Maczek, also remained in Scotland. Stripped of his Polish citizenship by the People's Republic of Poland for political reasons, and also denied a military pension by the British government, in the 1950s Maczek found work as a storeman in the small Co-Operative store in the village of Giffnock, East Lothian. The disparity between Maczek's abilities and his humble occupation was in part due to the fact that Polish soldiers in the post-war UK were seen as potential Communist spies and were thus denied any role in government controlled organisations or businesses, including the army.⁷² In the 1960s, Tomasik and Maczek happened to become near neighbours in Edinburgh, with Tomasik offering work to his former CO as a barman in his Edinburgh hotel, the Learmonth. Like many of Maczek's former troops, Tomasik held a deep respect and reverence for his former commander, and over the years a firm friendship developed between the two men. This respect was shared by other Division veterans (who referred to Maczek as 'Baca', a Galician term meaning 'shepherd'), with the general providing a figurehead and focal point for their post-war community (Donnelly 2013). According to the folk-lore that surrounds Maczek, whenever any of his former troops gathered at the bar of the Learmonth Hotel, they would salute and click their heels to the elderly barman to the bemusement of unknowing hotel patrons (Donnelly 2013). In later years, Maczek was made an honorary Dutch citizen and awarded a military pension from the Dutch government in recognition of his role in liberating the town of Breda from German forces.

Aware of the Black Barony Hotel from its wartime use for training Polish officers, in 1968 Tomasik added the property to his portfolio of hotels. After a period of refurbishment, the revamped hotel opened for business in the spring of 1971, with the hotel managed by Tomasik's daughter Catherine and her husband Marek Raton. Throughout the decade, the elderly General Maczek, his wife and daughter were regular summer guests at the hotel, using a room made available to them in the Tomasik family's personal accommodation. It

was during these years, that Tomasik would formulate and execute plans to construct 'the Great Polish Map of Scotland'. Why exactly though, did Tomasik choose to undertake such an unusual and ambitious project? As with much of the Map's story, the answer to this question is largely one of considered speculation and hearsay due to a dearth of primary evidence, though we can piece together various strands to form a 'reconstructed' narrative.

Beginning with practical and rational motivations, it is not unreasonable to speculate that as an entrepreneur with obvious business acumen, Tomasik would have considered the presence of a sizeable relief map in his hotel grounds as a unique point of interest for hotel guests and tourists alike. Furthermore, according to Tomasik's son-in-law Marek Melges, Tomasik was acutely aware that visitors to the hotel whether from Europe or within the UK, appeared to have a limited appreciation of the geography of Scotland and the distances and spatial relationships between the various destinations on their tailored coach-trip itineraries (Traynor 2014). As such, Tomasik considered the Map as a point of interest to such visitors as well as a means of remedying their geographical naivety – maps, after all, are primarily a means of conveying geographical information to allow the user to locate oneself within a wider spatial context. According to family testimony, Tomasik is also known to have been fascinated by a large-scale 3D map of the Belgian landscape during a visit to the Brussel's World Fair of 1958, with a footbridge over the map allowing observers to gain the bird's-eye view of cartographic convention (Traynor 2014) (See Figure 55).

Though it is unclear to what extent Tomasik's military experience had on his desire to construct the Map, there are of course inherent links between the military and mapping traditions, with large-scale 3D relief models used extensively throughout World War II for strategic planning (Pearson 2002). Tomasik would likely have been influenced by his military experience and exposure to strategic mapping and was reportedly fond of pointing out sections of the Scottish coastline that Polish forces had been responsible for defending in 1940-1941 to hotel patrons (Traynor 2014). Perhaps then, the Map was partly intended as a reminder of the contribution of Polish forces to the coastal defence of Scotland as well as the more personal dimension that many of these troops, such as Tomasik, had elected to make Scotland their adopted home. Though Tomasik's inspiration and desire to construct the Map were likely diverse, the simple answer which has come to be told through the Map's current guise as a historical monument and its associated discourse of webpages, leaflets and on-site interpretation boards is the notion of the Map as a 'gift to the nation', with Tomasik's

reputed statement that "I shall die, but I shall leave my map as a gift to the Scottish people to thank them for the hospitality they showed the Poles when it was needed". As Keith Burns of Mapa Scotland stated, this 'hook' and soundbite for the Map's creation is an amalgam of sorts, pieced together by "speculation and semi-fabrication - it was the conclusion we came to from circumstantial evidence".⁷³



Figure 55: The scale model of Belgium at the Brussel's World Expo thought to have inspired Tomasik (*Image: Wikipedia*)

Having dreamed up the idea of gifting the Scottish nation with a miniature version of itself, how did Tomasik secure the expertise necessary to get such an unusual project off the ground? In the 1970s the People's Republic of Poland was gradually opening up to the world, with Polish emigrants more easily able to visit their homeland. During one such visit to Krakow in 1973 to attend a gathering of distinguished members of the Polish diaspora or

'Polonia', Tomasik met with the influential geographer, Professor Mieczysław Klimaszewski, rector of the nearby Jagiellonian University, with whom he discussed his idea of building the Map. As well as his leading role at the Jagiellonian, Klimaszewski had been elected to the Polish Council of State in 1965, chairing the Supreme Council for the Polish Diaspora – a body tasked with the role of cultivating stronger links between the People's Republic of Poland and affluent members of the far-flung Polish diaspora such as Tomasik (Kelly 2014). With his geographical background and political influence, Klimaszewski was ideally placed to assist Tomasik in his unusual endeavour and duly forwarded two geographers from the Jagiellonian University's Institute of Geography for the project, Kazimierz Trafas and Roman Wolnik. While acting as chairman of the Tatra National Park, Klimaszewski had previously entrusted Trafas to oversee the production of a vast atlas of the region, documenting and compiling numerous aspects of its physical and human geography, including its potential for tourism (Kelly 2014). Tomasz Trafas, the younger brother of the late Kazimierz Trafas and former Polish Consul General in Scotland speculated that Klimaszewski was likely also motivated to aid the building of the Map as a means of 'reaching out' to the exiled Maczek for political purposes:

And as far as I know Klimaszewski wanted to meet with Maczek. I don't know if he finally met him or not personally, but the main reason was that they...there was a question of Maczek's Polish citizenship. And the citizenship was taken by the Communist authority because of the serving in the British army and so on. And all these officers who didn't want to come back to Poland, they were officially condemned by the Communist government. And for Klimaszewski there was some kind of...he wanted...he tried probably to give some kind of explanation to forgiving, to Maczek. He has some ideas that it's a big fault you know, of the Communists to take this citizenship. So I think it was something which was in Klimaszewski's mind - OK, when Maczek is there, they wanted to, they have some idea to build this map of Scotland. I will give permission to work as some kind of scientific experiment, and the university will not pay for that, because it's paid by a private person. But I'm giving my permission to use as a reason of travel for our home office, because it was not so easy to get passport. And what was the reason you are going to Scotland you know? You have no family, no friends, and you wanted to go to Scotland. So, the reason was there was some kind of research work connected to the construction, helping of construction of the map of Scotland, together with some Scottish businessman.⁷⁴

Construction



Figure 56: Dr Kazimierz Trafas (left) and Roman Wolnik take a break during the Map's construction, 1975 (Image: Jerzy Zelech)

The only first-hand account of the Map's construction is from the recollections of Janusz Szewczuk, who as a young student of the Jagiellonian's Institute of Geography, was invited to work on the Map in the summer of 1975. A firm friend and colleague of Kazimierz Trafas in their ensuing academic careers, this section draws from Szewczuk's recollections. Trafas died unexpectedly in November 2004 with Szewczuk writing his account of the Map in memory of his friend, who he describes as: "a very colourful character; a person of indisputable authority in cartography and remote sensing, he created many theoretical and practical projects and saw them to fruition. There is one project in his diverse output that has never been acknowledged" (Szewczuk 2005: 1).

Though the bulk of the Map was constructed in 1975, the initial groundwork was laid a year earlier in the summer of 1974 with the initial visit of Kazimierz Trafas and Roman Wolnik from the bustle of Krakow to a quiet corner of the Scottish Borders (see Figure 56). After a short tour of the Highlands to gain a better understanding of the mountainous character of the Scottish landscape, Trafas and Wolnik set to work across the summer while lodging

conveniently at the hotel. The cartographers decided that a 1:10,000 scale would be appropriate for the large size of the Map, with a 5:1 vertical exaggeration employed to give greater altitudinal emphasis to its mountainous topography. Indeed, without this vertical (and by rote, horizontal) topographic exaggeration, even Ben Nevis would have been left barely distinguishable at a height of 13cm on a 1:10,000 scale (Little 2014). Interestingly, the 1:10,000 scale was a design standard utilised by wartime Allied forces in the construction of airborne landing relief models, intended to effectively convey the 'lay of the land' and notable topographic features such as woods, waterways, roads, railways and built-up areas to pilots and airborne troops (Pearson 2002: 232).

With the assistance of Tomasik's son-in-law and hotel manager Marek Raton, and the estate farmer and general handyman, Bill Robson, Trafas and Wolnik began preparing the site on the hotel's former bowling green by excavating approximately 1.5 meters of soil and subsoil to create the 50 metre by 40 metre oval pit in which the Map sits, before levelling its surface. After these labour-intensive preparatory groundworks, Trafas and Wolnik then set up a local coordinate system to provide a framework for the Map's construction, utilising taut string set out in a series of straight lines to create a cartographic grid. This grid allowed for the more accurate delineation of the Map's coastline on the base of the pit, with a system of vertical shuttering put in place to create a coastal boundary. Once this coastal shuttering was in place, concrete was then poured within to create the Map's sea level foundation at a height of 50cm above the base of the pit, with uniformity of height checked regularly with a theodolite and spirit level. Having created the base sea-level foundation of the Map, a series of terraces were then set up to act as contours. A volume of 'half-inch' Scottish maps from the Edinburgh mapmakers, John Bartholomew & Sons was utilised as a master reference and cartographic guide, which were later discovered in the hotel in 2003 (See Figure 57). Though in theory the number of contours deployed could have replicated those of the Bartholomew maps of Scotland, practical limitations and a scarcity of time meant that the number of contours created was limited to three - equivalent to 300, 600 and 900 meters above sea level. The construction of these terraces or contour levels was undertaken in the same manner as the coastal foundation, through vertical shuttering and infilling with concrete. With summer drawing to a close and initial preparations completed, Trafas and Wolnik returned to Krakow to resume their day-to-day professional lives in the Jagiellonian's Institute of Geography. Though the Map's progenitor Jan Tomasik was happy with the progress made during this initial phase of construction, he concluded that more

manpower would be required the following summer to complete the project in a timely manner.



Figure 57: The Bartholomew Survey Maps of Scotland used to guide construction on the Map itself, 1970 edition (*Image: Mapa Scotland*)

In May 1975, Tomasik drove a hire van to Krakow, returning to Scotland with Trafas, Wolnik and three students from the Institute of Geography to provide extra labour - Zygmunt Olecki, Jerzy Zelech and Janusz Szewczuk. In the break between construction efforts during the previous year, Trafas had concluded that a miniature 3D model of Scotland would be a useful visual aid in guiding the manual sculpting of the Map's topography across such a large canvas, which could subsequently be put on display in the hotel's reception to pique the interest of visitors.

During an era in which the digital age was in its relative infancy, Trafas deployed some innovative techniques to create this experimental 3D model. Choosing a scale of 1:500,000 with the same 5:1 vertical exaggeration deployed on its full-size counterpart, Trafas created the model by 'programming' a CNC milling machine, which effectively carved out the

model's layered topography from a solid block of plaster – a process akin to 3D printing in reverse. To program the CNC machine, selected contours from a 2D map of Scotland were etched onto an electronic circuit board, with the height of each contour translated to a specific voltage. The difference in voltage between each contour thus guided the CNC machine in carving out the depth and approximate shape of Scotland's topography, with the spacing between adjacent contours creating overall gradients and slopes. Though manual corrections and smoothing to certain areas of the model were required due to the limitations of the CNC machine in replicating finer topographic details, its production illustrates the cartographic ingenuity of Trafas and his willingness to experiment with novel techniques. Due to the density of the plaster from which the model was shaped, a vacuum-film was applied to its surface to produce a lighter, more easily transportable facsimile that accompanied the Polish geographers on their second journey to Scotland (Szewczuk 2005: 3).

Having prepared the site after a ten month break in construction, the mapmakers set to work on the most difficult stage of the project - the manual sculpting of the Map's vast topography in the unforgiving medium of steadily setting concrete, to build a nation from the ground up. To complete this substantial task the Polish geographer-cartographers had to marry teamwork, cartographic expertise, spatial intuition, artistic abstraction and the muddy boots of hard graft. Guided by the Bartholemew's source maps and the miniature model created by Trafas, the land was gradually built up by delivering large batches of concrete to a specific topographic region, which was then manually shaped and sculpted around the height terraces or contours set out in the previous year. Wire rods were used to maintain the correct vertical proportions of particular peaks and aid the sculpting process. With a team of two responsible for the general shape of the batch, another pair for the finer topographic detail and a fifth individual responsible for mixing and delivering the concrete (see Figure 58), this lively and busy cartography must have been a highly embodied, collaborative and challenging affair (see Figure 59). To aid the sculpting process, a finer aggregate of concrete was produced which could be more easily shaped and worked, as opposed to the 'thicker' mix used for the Map's foundations (which had also been bulked out with rubble infill). This manual modelling of the Map's topography over such a vast canvas presented the greatest challenge to its makers, requiring "an artistic eye for the spatial and geometric relationship of the map" (Szewczuk 2005: 3), as they sought to represent a landscape formed in the deep time of geological aeons with quick, deft movements of shaping hands and digits, working against

the time pressure of steadily setting concrete - the precise techniques of their cartographic expertise meeting a less familiar realm of intuitive, sculptural artistry.

Another challenge for the Map's makers was to meet Tomasik's desire that as well as its surrounding sea, the Map should also include Scotland's major rivers and lochs. How impoverished would Scotland be after all, with no Loch Ness, Loch Katrine or Loch Lomond to harbour its myths and legends? To achieve this, a series of water pipes were installed in the body of the Map as modelling progressed, adding to the technical complexity of the project. Despite the engineering headache of this later hydrological addition to the Map's design, on the 24th July 1975 (which also happened to be Jan Tomasik's birthday), modelling was completed, and a topping-out ceremony was conducted on Ben Nevis, the traditional ceremonial champagne substituted with vodka.

With the bulk of the work completed, in the subsequent summer of 1976, Trafas and Wolnik visited the Map for the third time, with some finishing touches and adjustments applied to the Map's topography. From the few photos of the Map under construction, it is also apparent that during this time the Map was coated in white paint or resin in a bid to protect it from the elements (see Figure 60). After 1976, work on the Map slowed down with Trafas and Wolnik paying a final visit in 1977. Between 1977 and 1979 Tomasik oversaw the completion of the Map, with its retaining wall built and previously excavated soil banked up around the Map's pit to create a slight slope around its perimeter. According to Szewczuk (2005: 4), Tomasik also had the Map painted to highlight forests, urban areas and major roads, and water was pumped through the underground pipework to supply its rivers and lochs. Tomasik's plans to build a metal walkway over the Map to allow visitors a bird's eye view (as he had experienced himself at the Brussel's Expo of 1958) never materialised.



Figure 58: Roman Wolnik and Zygmunt Olecki working a batch of concrete (*Image: Jerzy Zelech*)



Figure 59: From L to R, Marek Raton, Roman Wolnik, Zygmunt Olecki and Janusz Szewczuk discuss the Map's construction during a tea break (*Image: Jerzy Zelech*)

Though it is unclear whether the Map was ever completed to the extent reported by Szewczuk (no photographic evidence of the fully painted Map with working hydrology exists), there is no doubt that its construction was a notable achievement of sculptural cartographic landscaping. In his account of the Map's creation Szewczuk reflects that "the construction of the concrete map bore no resemblance to traditional cartographic methods" (2005: 3), with various topographic errors and inconsistencies in scale across the Map attesting to this. However, though the engineering of the Map lay outwith the realms of conventional 2D cartographic method it is certain that the cartographic expertise of Trafas and his team were integral to realising what is in fact, more a model than a map, and an impression rather than a facsimile. Indeed, as Szewczuk states, the map-cum-model was "a bold and imaginative cartographic venture" (2005: 4), even in the context of twenty-first century digital cartography. It is for this reason perhaps, that despite its relatively simple means of construction, the map exists as a rarity, and perhaps even (as is claimed), as the largest outdoor terrain relief model in the world.



Figure 60: The map being 'whitewashed', circa 1976-77 (Image: Mapa Scotland)

It is also interesting to reflect on the personal experience and motivations of the Map's young builders. One can imagine that the challenge of constructing the Map was not only attractive to Kazimierz Trafas and his colleagues as an experimental cartographic exercise, but also as a gilt-edged opportunity to cross the Iron Curtain and travel to far-flung Scotland at the behest of a somewhat eccentric Polish businessman. As Tomasz Trafas considers:

So some people ask me, why did my brother and the others? [build the Map]. My answer is try to imagine, there is a couple of things which were important for them. Of course one thing, there was the opportunity to visit another country as young men. So they'd been very active, they still have a lot of ideas to do and Scotland was still fascinating. You know many people - OK England, London. That's not so many possibilities to travel to Scotland, so to be in Scotland, that was another reason. Secondly, you know there was these Polish-Scottish links, so that was kind of another motivation, and there was a challenge for them as a geographer. Because they use all the instruments, all these tools, all this equipment. They prepare the theoretical background here in Krakow, the small model as well, so there was for them some kind of natural practice. You know, so for geographers it's so important, they are not people who are making research just sitting at the desk in the university building. So there was a big occasion to have fieldwork which was paid by some crazy businessman! (laughs) who wants to support such an idea.⁷⁵

Though a compelling cartographic object in its own right, the Great Polish Map of Scotland is made all the more evocative by its Polish backstory and genesis. Indeed, one would have thought that such an unusual concrete paen to the Scottish landscape would have to have been dreamed up by a native Scot, enmeshed in the landscape and culture of their country. However, its genesis in the mind of a Pole who came to call Scotland home after being forced to flee his own, adds a potent emotional register to the Map. Christine de Luca, a Scottish poet, captures the emotional landscape of the Map by way of a 'concrete poem' in memoriam to its Polish progenitor, Jan Tomasik. Though De Luca wrote the poem in 2015 after learning of the Map's rediscovery and restoration, she draws upon a chance meeting with Tomasik at the Map during its construction in 1975:

Mapa Scotland

im Jan Tomasik, died 1991

He was wedged into the Firth
of Lorne when I saw him, one hand
reaching to Ben Nevis, checking the elevation; the other clutching his quarterinch map, its folds long tattered.
He was engrossed in his own creation:
a colossal concrete model of Scotland,

it

so big you could leap from peak to peak, scramble over its topography
Set within a low retaining wall it might have been an oval play-park. From
outer space it would have shown the face of Scotland as a well-carved, perfect
cameo. Though old and worn, he was intent, deliberate, visualising how

would look layered in colour from greens through shades of browns to purples to enliven grey cement. And river basins:

if he'd got them right, the streams would trickle from corries and heights, gather pace to rush through gorges, wind across flood plains, drain into estuaries and firths.

All that measuring and levelling

to make it accurate. A work of art, of head and hand and heart in fusion; a vision, a gift for his adopted land,

ho -mage to Scotland whose coast, from Montrose

to Col -dingham, the 1st Polish Armoured

Div -ision had defended secretly. They were soon to leave for Normandy. When peace came, they stayed on, settled down. He bought the land, the old house where they had trained together, modelled terrains to check supply

lin-es, strategies. The map remains a symbol

of friendship bridging nations,

of skill and spirit, of endless

cr -eativity which no war

can quench.

Christine De Luca

Ruination: the state of the nation

The emotional, poetic register of the Map evoked by De Luca is enhanced further by the fact that Tomasik's desire for it to become a tourist attraction and focal point was never fully realised. Indeed, Tomasik had secretly confided to his family of his desire for the Map to be officially opened by Queen Elizabeth, the Queen Mother (who Polish veterans held in high esteem after her morale-boosting visit to Polish troops stationed in Arbroath in March 1941 alongside King George VI) (Traynor 2014). Only a few short years after its 'completion', the Map began a gradual slide into obscurity and ruin (see Figure 61). As De Luca describes in her poem, Tomasik was an elderly man at the time of the Map's construction and in 1981 he retired due to declining health, though the hotel and estate remained in the family and were passed on to his son, Jan Tomasik junior. Following in his father's entrepreneurial footsteps, Jan Tomasik had managed Learmonth's International Hotel in Edinburgh and had strong Glaswegian connections as manager of the Apollo Theatre (and an emerging Billy Connolly) and was also part of the operating team behind Radio Clyde (Kelly 2014).

Despite Tomasik junior's wealth of business experience, in 1981, a fire severely damaged the hotel's main block, requiring a costly rebuild that exerted financial strain on the business. In 1985 the hotel closed, but in the following year Jan Tomasik junior sought to reconstruct the business through the Business Expansion Scheme, in which investors received significant tax incentives to invest in specific projects (Shields 1992). Though it is reasonable to conclude that throughout this period of financial concern the map was afforded little in the way of direct maintenance and care, the prospectus for the hotel's share issue included a plan of the grounds and the words, "A feature of the gardens is a rare, if not unique, relief map of Scotland with waterways" (Kelly 2014). However, despite attracting significant investment and completing a modernisation upgrade of the hotel by the target date of May 1988, one of its key investors, the merchant bank Hill Samuel withdrew their financial support for the project and called in the administrators (Shields 1992). Despite Tomasik's best efforts to buy the hotel back from the administrators as a going concern, in June 1989 it was sold to new owners. In the same month Tomasik was requested to leave the premises by two sheriff officers, bringing to an end the twenty-one-year connection between Barony Castle and the Tomasik family.

As ownership of the hotel passed from the hands of the Tomasik family, a vital link to the map was cut, with care and maintenance neglected by subsequent owners. However, despite the loss of this familial connection, and processes of decay already underway, the Map continued to dominate the south lawn of the hotel and it featured in an article in the Sun newspaper in 1992 as an item of local curiosity (Kelly 2014):

James Paton isn't kidding when he tells guests they can see the whole of Scotland from the back of his hotel. The 157 ft long, 131 ft wide replica, complete with hills and glens, has well and truly put the country on the map. The masterpiece includes a 5 ft high model of Ben Nevis – plus a model train running between Glasgow and Edinburgh. James said: 'Sam and his friends deserve the recognition for getting it back in shape. It's all made of old tin cans, chicken wire and things, then covered in cement. It even has rivers and waterfalls.

As the article suggests, the Map had been lightly refurbished at this time (though the repairs were likely cosmetic at best) and a few years later in 1995 it was utilised as a backdrop and prop in a film produced by the Scottish Office to illustrate the reorganisation of local government areas (Kelly 2014). In this sense, though it is tempting for the sake of narrative effect to describe the Map as 'lost' after ownership of the hotel passed from the Tomasik family, it is clear that owing not least to its substantial physical presence in the hotel's landscaped gardens, it intermittently piqued the interest of subsequent owners and other parties. However, notwithstanding the odd bit of coverage, throughout the 1990s the Map slowly but surely slid into neglect and physical ruin as it lay at the mercy of the elements. As Lucas points out, "entropy is a social as well as a natural phenomenon" (in DeSilvey 2012: 49) and without the Tomasik family in place to preserve the personal meaning of the Map, in effect, its story became fragmented and the people behind its creation forgotten. Without this deeper meaning and personal connection, the Map would have been of limited interest to subsequent proprietors of the hotel whose attention was largely focused upon the day-to-day operations of the hotel and its finances, with little time to spare on the upkeep of the increasingly overgrown and dilapidated concrete curiosity in the hotel gardens.



Figure 61: The Map in 'ruin', 2011 (Image: Mapa Scotland)

As DeSilvey states, "the degradation of cultural artefacts is usually understood in a purely negative vein: the erosion of physical integrity is associated with a parallel loss of cultural information" (2006: 318). In the case of the Map this rings true, with its physical degradation occurring hand in hand with a loss of cultural memory regarding its Polish backstory. In effect then, physically restoring and subsequently preserving the Map from future degradation was seen as the primary means of 're-remembering' its Polish provenance and 'righting the wrong' of its initial dereliction. Before considering this episode in the Map's story however, it is important to paint a clearer picture of the Map as a 'ruin'. After all, the Map was effectively in a state of slow ruination almost as soon as it was completed, with the hotel fire in 1981 and the subsequent struggles of the Tomasik family to retain the business pushing its maintenance to the sidelines.

Rather than treating the Map's three decades in the hinterland as a void in its story then, we can consider its physical degradation and resulting hybrid materiality of concrete and colonising nature as a rich and compelling episode in its life, taking up the assertion that

"ambivalence and ambiguity should not be seen as a failing but as a reservoir of meanings, which may be constantly elaborated and explored" (Jorgensen and Tylecote 2007: 458). Examining the Map closely in its ruined state also allows us, for the first time, to gain a level of proximity where the Map is perceived not from the neat and distanced God-like view of cartographic convention (or the drone), but as an up-close and messy materiality in which "function becomes subservient to form and substance" (DeSilvey and Edensor 2013: 477). In Figure 61, we see the Map at the extent of its 'ruination', with a cloak of colonising mosses and plants largely obscuring the grey of its underlying concrete topography. In contrast to the orderly, garden landscape of its surroundings, the Map appears almost as a miniature wilderness, where years of non-intervention and an absence of maintenance have allowed for the spontaneous expression of nature that often signals the marginal, untended, but ecologically vibrant spaces of urban wasteland (Gandy 2013).

My first encounter with the Map was in early April 2014, prior to the commencement of any significant restoration work. It felt weighted down by melancholia; a feeling doubtless deepened by drizzly, overcast weather. Indeed, one might have been forgiven for thinking that in the otherwise pristine surroundings of the hotel's landscaped grounds the shattered Map was some form of Romantic eighteenth century landscape folly or artificial ruin, intended to evoke artificial feelings of melancholia within the observer (Herrington 2006). Large sections of its concrete topography had been significantly or completely eroded by years of freeze-thaw cycles and weathering. The mountains of the Isles of Skye and Mull were no more, their topographies erased into flat and featureless grey expanses. The cracks, crevices and craters of this shattered landscape had created micro-habitats for a variety of colonising mosses and plants which now veiled the Map's topography; in places their roots and tendrils appearing to be all that was holding the concrete landscape together. Confronted with an entire nation in ruin, I felt the environmental anxieties of our time bubble to the surface of my thoughts. With its shattered landscape and depleted waters, perhaps this apocalyptic Scotland was a picture of things to come due to our anthropogenic follies? Or simply a fast-forwarding of ongoing geological processes which will eventually grind all of Scotland's mountains into rubble? (See Figure 62).



Figure 62: The shattered landscape of the Map in 2014 (*Image: author*)

Despite this degradation of the Map's material fabric over the previous decades, it remained physically imposing and indeed, impressive - the varied green patchwork of vegetation and mosses draped over it lending it an uncannily organic, earthy feel, as if it were simply the work of nature as opposed to human hands. On closer inspection however, traces of the Map's human makers became apparent across its topography, its gullies clearly shaped by human fingers and its mountain flanks imprinted with the form of ghostly hands as they carefully shaped and sculpted, transforming concrete into contours (see Figure 63).

Replicating the slow erosion that is part of 'real' Scottish landscape processes, many of the Map's mountains had been ground down by years of weathering and freeze-thaw cycles, exposing its foundations and inner workings. Indeed, decay uncovered archaeological truths beneath construction work: a number of large tin cans, sourced from the hotel's kitchens, were exposed as the geologic-core of many a mountain range (See Figure 64). No doubt utilised as a time-saving and cost-cutting measure, these improvised and somewhat flimsy foundations of sections of the Map's topography spoke of the logistical and temporal pressures of its construction, with certain shortcuts taken along the way that, ultimately, sped up its decay. The entropic exposure of underlying bricks, pipework and orange twine (used

to lay out the Map's cartographic grid), also provided traces of its makers method thirty years prior, resonating with DeSilvey's assertion that although processes of decomposition and decay destroy "cultural memory traces on one register, [they] contribute to the recovery of memory on another register" (2006: 318). Due to the tumbledown materialities of ruins, these memories surface as a "disorganised matrix"; momentary flashes and flares evoked by encounter and perception as opposed to the imagined linearity "and fixed memories of overcoded heritage and ceremonial space" (Edensor: 2005: 845).



Figure 63: The maker's mark. Note the finger shaped gullies (left) and handprints (right) (Image: author)



Figure 64: Old cans from the hotel kitchens exposed by the Map's degradation (Image: author)

Though now only existing in photographs and recent memory, what the Map offered in its ruined state was a compelling example of the mutability of human-made things (even the supposedly 'concrete') and the speed with which nature reclaims them when external events lead to their dereliction. This blurring of the boundaries between the natural and the cultural, illustrates the capacity for ruins and the process of ruination to invite alternative registers of aesthetics, memory, contemplation, feeling and intellectual inquiry (DeSilvey and Edensor 2013). As well as degrading matter, time can also imbue meaning, and while its passing had shattered much of the concrete landscape, it had also gradually endowed upon it that sense, property, or feeling, we refer to abstractly as 'heritage'.

Perhaps then, we might speculate on an alternative outcome where the Map was left in its long-ruined state as a means of illustrating the inherent instability of things, and their oscillation between "utility and redundancy, investment and abandonment" (DeSilvey 2012: 49) and "allowing other-than human agencies to participate in the telling of stories about particular places" (DeSilvey 2006: 318). Though ostensibly an interlude in its narrative, the Map did not cease to exist when in its ruined form, but became something else altogether a natural, living landscape, a habitat, and a metaphor for the brevity of human life and the instability of the meanings we ascribe to the world around us. In this sense, we must consider the question, was there an essence of authenticity that was lost by restoring the Map? The nineteenth century art critic John Ruskin "claimed that the value of an historic monument resides precisely in the visible marks of its past, meaning the passage of time which has worn it out, as well as traces left by its constructors' hands" (in Klekot 2012: 461) and for Walter Benjamin "the authenticity of a thing is the essence of all that is transmissible from its beginning, ranging from its substantive duration to its testimony to the history which it has experienced" (1968 in Jeffrey 2015: 147). In this sense, the ruin and degradation suffered by the Map as well as the traces of its makers were integral to its authenticity. Just as tellingly, in a TripAdvisor comment (posted 3rd January 2018), a visitor to the Map hinted at the notion of something being 'lost' in its restoration by the removal of its patchwork of moss and lichen which had a naturalising effect and conveyed its years in the wilderness:

Saw the map in 2012 prior to it being cleaned up and returned to its current state. The back story is worth reading and the volunteers who have restored it to its current glory deserve massive praise for what they have achieved however I can't help thinking it looked better maybe more realistic when it was covered in varying shades of moss/lichen etc.⁷⁶

While leaving the site in its degraded state was never a realistic option within the context of conventional conservation strategy, its time as a ruin should also be remembered as an integral and compelling episode of its ongoing existence Doing so acknowledges its more recent history as a mysterious ruin and local curiosity, around which various stories and folklore orbited. Furthermore, a consideration of the Map's decades in the wilderness and the ruination it endured leads to a greater appreciation of its subsequent 'rediscovery' and restoration by a small group of enthusiastic retirees – perhaps the most compelling episode of its life to date. Indeed, the Map would likely remain in ruin to this day if it wasn't for the intervention of this serendipitous community of interest, who made it their mission to restore the Map physically and culturally to become an official component of the nation's heritage fabric. Enfolding this more recent narrative of heritage activism and salvage into the Map's onsite interpretation is a means of highlighting the importance of such unofficial communities of interest in activating, and advocating for, such 'marginal' heritage sites whose social values may otherwise go unrecognised by official bodies (Jones 2016).

Hiatus: hinterland

In 1994, the Map's creator (and now Professor), Kazimierz Trafas, visited Edinburgh to attend an EU-funded town planning conference concerning how historic cities such as Edinburgh and Krakow might best manage modern urban development. Since constructing the Map in the mid-to-late 1970s, Professor Trafas had built a successful and highly distinguished academic career from the Jagiellonian's Institute of Geography, specializing in remote sensing and the interpretation of aerial photography. From 1990 onwards, Trafas took up a position at the Office of the City of Krakow as head of its Strategy and Development Department, resulting in his 1994 visit to Edinburgh. In informal conversation during the conference, Trafas mentioned his somewhat esoteric work on the Map to some Edinburgh-based conference delegates and inquired as to its condition. This passing encounter sparked initial interest in the Map amongst a receptive and interested audience. Returning to the Jagiellonian University in 2002, Professor Trafas lectured extensively on the study of cartography, remote sensing and aerial interpretation before his death in 2004. Despite publishing extensively throughout his career, Trafas never wrote formally on the construction of the Map, perhaps as it lay somewhat outside of his professional academic output.

In 1996, a couple of years after Trafas' trip to Edinburgh, Keith Burns was attending a conference at the Barony Castle Hotel in his professional capacity as a nuclear engineer. During a break in proceedings, Burns happened to stumble across the now heavily overgrown Map. As he recalls:

In 1996 on other business, I was wandering around the old landscaped grounds of the Barony Castle Hotel at Eddleston on a beautiful spring morning. I came into a clearing that had a strange circular walled pit about 1.5m deep and about 40 metres in diameter. The base of the pit seemed to be very uneven bedrock. I walked around it wondering what on earth it was. Around half the circumference, in astonishment, I recognised the overgrown outline of the Mull of Galloway, then the Clyde Coast, Arran, Bute and beyond. I jumped down into the weed-strewn pit and was amazed to recognise more and more detail of what was a 3-dimensional terrain relief model of the whole of the Scottish landscape. I hopped across the Border hills and over the Tail of the Bank to recognise Ben Lomond, Ben Lui, the Glencoe Hills, Ben Nevis and much more. Five minutes later I was at Cape Wrath, stunned by my discovery. Inquiries at the hotel reception drew a blank. No-one there knew anything about it, or seemed to be interested either. Further inquiries to friends who lived in the near vicinity were equally fruitless.⁷⁷

As evidenced by Burns' account, approximately seven years after the hotel had passed from the ownership of the Tomasik family, the Map was in a state of some neglect and its story had effectively been lost from local memory. This is perhaps unsurprising when one considers that Tomasik's wish for the Map to act as a local attraction was never fully realised due to extraneous circumstances such as the hotel fire in 1981 and the subsequent financial difficulties caused, as well as the fact that its construction was something of a 'private passion' and, upon completion, never fully publicised. However, as a lifelong hill-runner with a deep affection for the Scottish landscape and an engineer's curiosity, Burns was compelled to find out more about the origins of such an impressive and impassioned feat of construction. He managed to make contact with those few who already knew of the Map -Roger Kelly and David Cameron, two Edinburgh-based town planners who had been told of the Map by Kazimierz Trafas during the aforementioned 1994 Edinburgh-Krakow conference. As Burns recalls:

Go back to 1996 when I was at this conference at the hotel and I discovered the map, and to my astonishment discovered that nobody in the area could tell me anything about it. After that, when I was out hill running, occasionally I'd take mates to see it, and anybody with an interest in maps and the mountains is instantly fascinated by it. So between 1996 and 1999 when I retired it just nagged in the background that somebody had put an incredible amount of creative effort into it, and then it had been abandoned. And I didn't even know anything about it – I didn't even know who had built it. But when I was at work I had no time because I was fell-racing as well, and when I retired I started thinking - "right, I've got to have a plan now for

what I'm going do with all this time", and one of the natural things on the shopping list was to try and get to the bottom of who built this map and to try get it restored.⁷⁸

After ten years of subsequent research, which included a personal visit to Krakow to meet with Professor Trafas, Burns and a small team of fellow enthusiasts gradually reassembled the story of the Map, tracing its origins back to the Polish presence in Scotland during World War II and the post-war lives of Jan Tomasik and his erstwhile commander General Maczek. In reassembling the Map's 'true story', certain local myths and misunderstandings surrounding it were dispelled, including claims that it had been built during the war by Polish prisoners of war (despite the fact that they were firmly on the side of the Allies), or that it was the brainchild of General Maczek, as opposed to Jan Tomasik. Such misconceptions about the Map illustrate the fact that just as an object or artefact physically degrades when uncared for, so too does the veracity of its story. Much like the physical erosion suffered by the Map then, without a teller, its story became cracked, fissured, fragmented and obscured, with conjecture occupying the narrative spaces left behind, akin to colonising weeds.

Having gradually untangled the Map's story from the many local myths and misinformation that had sprouted during its years of neglect, after retiring, Burns set about assembling a team of fellow enthusiasts with a view to rescuing the Map from its condition of serious decay, and ultimately restoring it to its original condition. As we shall see, the restoration of the Map's story and its historical provenance over the previous years was vital in advocating and gaining support for its physical, as well as cultural and political renewal. The campaign to restore the newly christened 'Great Polish Map of Scotland' began with an exhibition in Penicuik Town Hall in 2008, in a bid to raise local awareness and garner support for its restoration. Subsequently, in 2010, Burns and a small group of fellow enthusiasts, Jim Barton, Nick Macdonald, David Peck, Roger Kelly and David Cameron formally constituted the voluntary group 'Mapa Scotland' (from the Polish Mapa Szkocji), with the remit of restoring, preserving and promoting the map:

...to ensure that it becomes a permanent feature in the Borders landscape and an educational resource and visitor attraction for future generations to admire and enjoy. The map is a physical testament to the historical and cultural links between the Scottish and Polish nations in the past, and its restoration expresses a belief in ties continuing in the future.⁷⁹

Interestingly, Burns, alongside fellow Mapa Scotland founding members Jim Barton, David Peck and Nick Macdonald were associates through their long-term membership of Carnethy

Hill Running Club. Although the Polish provenance of the Map is now central to its contemporary meaning as a historic object, the original motivation for Keith Burns was a love of the Scottish landscape. As Burns recalls:

The other interesting thing about this early phase was that I didn't have any particular interest in Poland - I didn't even know it was connected with Poland although Roger [Kelly] did. But all my motivation was that somebody had created a 3D model of the whole of Scotland - that was 95% of the incentive to get the map restored, and the process of developing an interest in Polish history came along later.⁸⁰

After striking an access agreement with the hotel's owners (including freedom of entry for the visiting public), in 2010 initial restoration work was limited to clearing the substantive covering of vegetation from the Map and the accumulated concrete debris. In June 2012, Mapa Scotland secured formal charitable status, enabling the group to more effectively pursue various avenues of funding and official advocacy. In search of broader official recognition and financial support, one of the key breakthroughs for the Mapa Scotland team was campaigning for, and securing, its status as a designated Category B Listed Building by Historic Environment Scotland, which in effect, transformed the map from a neglected ruin, to a legally protected relic. The unusual nature of the Map within Scotland's cultural heritage was apparent in the administrative uncertainties among HES officers about exactly what the Map should be classified as; with the organisation's traditional portfolio comprised of castles and country houses. Despite this typological head scratching, the Map was listed by HES in August 2012. In the preamble to the Map's associated Statement of Special Interest, this description of the 'Great Polish Map of Scotland' is entered:

...a large and important cartographic sculpture in the grounds of Barony Castle Hotel (see separate listing). The Map serves to commemorate the presence of Polish forces in Scotland during World War II and their significant contribution to the allied war effort. Built on a scale of 1:10000, it is understood to be the largest topographical relief model of its kind in the United Kingdom by a considerable margin.⁸¹

What the entry illustrates is not only official recognition of the Map's unique cartographic and sculptural qualities, but also a recognition and 'locking-in' of its wider cultural meaning as a commemorative object to the Polish presence in Scotland during (and after) World War II. Whether an act of commemoration was at the forefront of Tomasik's idea or not, it is a popular narrative that serves to lend the Map a contemporary cultural relevance and meaning. Indeed, this reinvention or perhaps more accurately, refiguring, of the Map 'as monument' was a vitally important means of gaining wider political advocacy and financial

support for its restoration and renewal. In effect, the listing of the Map, 'put it on the map', as an official component of Scotland's national network of built heritage - according it the iconic brown-coloured road sign to alert passing motorists on the A703 to its location. As Tomasz Trafas reflects:

I think there was also another milestone when they created this special road sign that says there is a historic monument, because it's giving a status for that place, and it's giving also a legal protection for that place. So the changing of the status of the map so that it's a historic site, that was so important and that was a big success of these people, and of this group, Keith's group and the others – that was a big success. It was a big turning point and I was so so happy about that and I congratulate them – that was the moment you know?⁸²

Soon after the Map was granted listed status, it gained valuable political and public exposure thanks to the local MSP for Midlothian South, Tweeddale and Lauderdale, Christine Grahame, who brought the subject of the Map to the Scottish Parliament in the form of a members' business debate on the 19th September 2012. Rather than a debate *per se*, in the session, Grahame tabled a motion for the Scottish Parliament to recognise the historical importance of the Map and to provide financial and cultural support for its restoration by Mapa Scotland. In her motion, Grahame calls for the Map to be recognised not only as a unique feat of "topographic landscape modelling" but also as an important symbol of long-standing cultural ties between Scotland and Poland. In a session lasting approximately forty minutes, following Grahame's motion, several parliamentary colleagues including the Culture Secretary, Fiona Hyslop, expressed vocal support for the Map and its restoration project, citing various examples of past and present cultural exchanges between the two countries.⁸³

The cross-party parliamentary support for the Map evidenced throughout the debate, and the manner in which it is used by the various speakers to highlight the positive role of Polish migrants to Scotland, illustrates its symbolic and political currency in the promotion of a modern, outward-looking, European Scotland, with the Map promoted as an extraordinary and evocative example of the wider contribution of Poles to the nation's economic and cultural life. Such an intertwining of landscape and nation is evident in the fabric of the Scottish Parliament building itself. When the architect Enric Miralles set out his inspirations for the design of the parliament, he was passionate that it should be a building that took inspiration from Scotland's landscapes, as he expressed "Scotland is a land, not a series of cities" (Lorimer 2002: 103). As Lorimer explains, Miralles drew inspiration from the

distinctive images he perceived of the Scottish landscape utilising "elemental symbols and primary signs as 'natural' connections between a 'people' and a memory of their primordial 'land'" (2002: 103). Though on an altogether different scale the use of the Map's miniature concrete landscape to represent a cosmopolitan version of Scotland in the twenty-first century, is evident in the closing remarks of the debate by the Culture Secretary, Fiona Hyslop:

I have been very pleased to confirm that, as a creative nation that is rich in heritage and which contributes to the world, Scotland is open to vital cultural exchange. It is appropriate to celebrate the great map of Scotland in the Scottish Borders as an important and unique memorial that commemorates the achievements of two countries working together. In securing the debate, Christine Grahame has allowed us to celebrate the work that the volunteers have done. More importantly, we have had an opportunity to remember, commemorate and celebrate the heritage that led to the map's creation and, vitally, to continued dialogue, exchange and friendship between the people of Scotland and the people of Poland.⁸⁴

A parliamentary reception followed the debate, to promote and discuss the Map. Organised by the Polish Consulate in Edinburgh, it was attended by various MSPs, representatives of Mapa Scotland, and the Barony Castle Hotel. Speeches were delivered, by the then Polish Consul General, Dr Tomasz Trafas, and younger brother of the Map's creator, Professor Kazimierz Trafas, impressing on attendees the cultural importance of the Map (see Figure 65). Speaking in 2017, Trafas reflected on his serendipitous posting to Edinburgh during the formative stages of the Map's restoration campaign, as well as the energy and resourcefulness of Keith Burns in securing political advocacy and momentum for its renewal:

Yes, because you know my brother died in 2004, so there was the moment when Keith was travelling several times to Poland, and Southern Poland, he took these biking tours to Slovakia around the Tatra mountains by bike. So let's say he was so dynamic, and so strong with the idea, you know, he exposed the main idea to make the renovation of that place. So the question of revitalisation of the venue was one of the most important ideas of which Keith presented, and he transferred this idea to, let's say, some influential members of the Scottish Parliament, and at that moment I was there, so probably it was a little bit helpful you know? My posting and my, let's say, situation, in the terms that I represent one of the biggest minorities in Scotland, so for the local authorities, for the Scottish Government, members of parliament, I was a member of one of the important members of consular currently in Edinburgh so it was much easier to talk.⁸⁵

With the help of official advocates and the newly listed status of the Map, Mapa Scotland was successful in securing funding from various Scottish and Polish, governmental and non-governmental organisations (as well as individual donations and membership subscriptions),

with the main funding for the Map's restoration in place by 2013. Under a new Edinburgh-based ownership group sympathetic to the Map's restoration (and perhaps aware of its potential draw as a tourist attraction), the Barony Castle Hotel pledged a £25,000 donation to the Map's restoration, with the Heritage Lottery Fund granting a further £20,000. Alongside these key funding sources, Mapa Scotland were also able to secure financial support from the Consulate General of the Republic of Poland in Edinburgh, the European Leader Fund, Polish Connections, Scottish Borders Council Landfill Communities Fund, Scottish Borders Council Community Grant Scheme, the Foreign Ministry of Poland, the General Stanislaw Maczek Memorial Trust, and the Historic Environment Support Fund.⁸⁶



Figure 65: Polish Consul General Dr Tomasz Trafas (with Keith Burns and MSP Christine Grahame to his right) speaks at a reception in support of Mapa Scotland's restoration campaign at the Scottish Parliament following its coverage in a members' debate (*Image: Mapa Scotland*)

Part II - Reclaiming the Future

Nation building: the restoration of the Great Polish Map of Scotland

In Part II of this chapter, I consider the not inconsiderable task of rebuilding a country from the ground-up. As well as outlining the practical, on-site operations and the wider bureaucratic and logistical aspects of the Map's reconstruction as a heritage attraction, I also reflect on the voluntary, community-based nature of its workforce and restoration as a whole. To do so, I draw upon my situated, hands-on experiences as a member of the Mapa restoration team, working up-close and attentively within Scotland's concrete topography. These personal and proximate reflections provide a more intimate perspective on map-work, differing from the largely visual, and passive, experience afforded to the average visitor (who is kept from walking on the Map by a surrounding perimeter fence). My own physical experience offered an alternative "way of seeing" (Wylie 2006); my apprehension of the Map's miniature landscape being markedly different from the often detached, "birds-eye" view of its photographic representation across various media platforms.

Though the Map now boasts a strong 'community of interest' (the Mapa Scotland Facebook page is followed by 1836 people), ⁸⁷ the core volunteer group who regularly attended working parties during the Map's four-year restoration campaign was small, normally countable on the fingers of one hand. The majority of this core volunteer group were either founder members of Mapa Scotland or closely involved with the organisation, including Keith Burns (who took on the role of project manager), David Peck, Jim Barton, Nick Macdonald, Graham Little, Lyn Barr and Majka Koslowska. Primarily (though by no means exclusively) male retirees, this core volunteer group hailed from a variety of professional backgrounds, including a nuclear engineer, physicist, psychologist, cartographer and civil servant. Though many individuals and groups attended one or more working parties across various stages of the Map's reconstruction, the majority of the work and the overall impetus for the project was provided by this small group.

Having initially been limited to surface clean-up work and damage limitation that could be carried out with little expenditure (see Figure 66), after securing grant-aid status in December 2013, Mapa Scotland began its campaign to restore the map in earnest in January 2014 with the establishment of bi-weekly working parties on Thursdays and Sundays.

Restoration was completed in 2018, a timeline that exceeded initial projections, mirroring that of its original construction. As I explain, this longer completion time was due largely to unforeseen engineering hurdles that required unplanned expenditure (particularly with regards to restoring the Map's water supply), and a shortage of volunteer labour for what was primarily, a 'muddy-boots', labour-intensive task. In this section I outline the timeline of the restoration campaign and the major works undertaken before considering certain aspects of restoration work more closely.



Figure 66: Nick Macdonald during early clean-up work on the Map in 2012 (Image: Mapa Scotland)

2014: First Steps

Due to the outdoor nature of the work and the various equipment and building material necessary to undertake it, an on-site workshop and office were installed in the form of two garden sheds, indicating the beginning of major works to the Map and its transition to a building site. With an HQ in place and aided by a good spell of summer weather, a series of works were carried out at the Map across 2014. Prior to the commencement of restoration work on the Map itself, its surfaces had to be stripped back and its mossy green mantle cleaned off, as well as concrete rubble and soil removed, to allow a more accurate assessment of the state of the nation. Though clear-up work had begun in previous years, this stripping back of the Map still remained an ongoing and labour-intensive task, with the limitations of the small volunteer work force apparent. However, good progress was made in the spring of 2014 with the help of the No. 2 Scots Royal Regiment of Scotland (based at Glencorse Barracks in nearby Penicuik), whose troops helped with the removal of soil from the Map's basin floor in preparation for eventual reflooding, as well as eroded concrete from its body. To speed up the removal of atmospheric staining, moss and other vegetation from the Map's physical structure, a pressure washer was employed to scour the landscape clean. In total, approximately 200 tonnes of material were removed from the Map during its extended cleanup phase, evidencing both the scale of the task completed and of the Map itself.88 In preparation for its planned re-flooding, the Map's 155m perimeter wall was cleaned and recovered with three coats of reinforced render, and initial work began on locating, repairing and replacing the 1970s pipework which fed the map with water from the Fairy Dean Burn.

Work carried out during this first year of restoration also extended to the wider function of the Map as a heritage site. As well as improvements to the foundations of the Map's footpath (utilising recycled concrete rubble), a new safety fence was installed around the perimeter complete with three information panels detailing the story of the Map. These three information panels describe the Map's origins with Jan Tomasik, the role of the Polish Army in Scotland during World War II and its links to Barony Castle, the construction of the Map by Kazimierz Trafas in the 1970s, and its ongoing restoration. As well as these practical tasks, Mapa Scotland worked towards increasing awareness and support for the Map, with its members giving a series of talks on its folk-history as well as hosting several visits to the site from various organisations. Even during this early phase, the Map's restoration was generating interest from a number of media organisations, with both BBC and ITV Borders

featuring news items on the campaign. The Map was also visited by a team of Dutch filmmakers, producing a documentary on the 70th anniversary of the liberation of Breda by the 1st Polish Armoured Division under General Maczek's command during World War II, as well as a Japanese film crew producing a promotional Scottish tourism video for the South East Asian market. The presence of these international delegations at the Map evidenced its potency as an 'illustrative object', as well as its appeal beyond the borders of Scotland. However, despite the progress made during the first year of restoration and the wide variety of interest in the Map, in the group's 2014 end of year progress report, Keith Burns reflected that "A crucial priority from here on must be to increase our membership and particularly our volunteer labour force, which is crucial in determining the speed of completion of the restoration", ⁸⁹ alluding to the fact that the core volunteer group of Mapa Scotland members remained small.

2015: An Island Nation

By the close of 2015, "the major civil engineering work" to the restore the Map to its completed condition in 1979 was reported as achieved. 90 With the Map cleared of debris, much of this work focused on repairing damage to the foundations of Scotland's islands, the western archipelago having suffered particularly bad erosion due to the smaller landmasses and material inconsistencies that were a legacy of faults during the original construction process. Volunteer labour continued to aid the core Mapa Scotland team, with the EDF Torness community support team completing the foundation repairs to the Isles of Mull and Skye. As well as this work on rebuilding the Map's landscape foundations, its surrounding seas were replenished by the repair and replacement of its original 1970s network of underground pipes (see Figure 67). This improvised feat of hydrological engineering required unforeseen expenditure in both time and money for the Mapa Scotland team. This extra expenditure was due to leakages in sections of the Map's 150 metre network of underground pipework, caused by decay and poor original construction. Utilising a gravityfed water system to draw water upstream from the Fairy Dean Burn and return it 150 metres downstream via the Map's basin into the adjacent ravine (operating under an abstraction and impoundment licence from Scottish Environmental Protection Agency), East and West coast supply pipes were installed below the North Sea and the Inner Sound of the Hebrides, terminating at 12 points along the coastline via 90mm pipe inlets. The replacement of the Map's outflow pipe (which had been irreparably damaged by ground movement) on the steep

terrain of the ravine proved particularly complex, requiring the use of climbing harnesses and ropes as an added safety measure.



Figure 67: Replacing the Map's old pipework on challenging terrain (Image: Mapa Scotland)

A further hurdle had to be overcome when after initial test re-flooding, the Map's seabed turned out to be porous, with the water slowly seeping through into the earth below. Though this problem was solved by the hydraulic sealing of the Map's 'seabed' through the application of impermeable sodium bentonite clay, it led to further unforeseen expenditure as well as the suspicion that despite the *in-situ* pipework from the Map's 1970s construction, its original hydrological function had never been realised before its effective abandonment. The return of the Map's watery margins after approximately forty years thus proved a challenging affair, both logistically and financially. Achieving this milestone, like many others throughout the Map's restoration, served as a testament to the dedication of the Map's small group of volunteer advocates as well as the engineering and project management experience of Keith Burns. Indeed, the engineering aspects of the Map's restoration was another early motivation for Burns:

My background is engineering of course. And the other incentive for me was when I discovered the intention it be surrounded with water – I looked at the topography, and the burn, and I thought that'd be fantastic to engineer a gravity-fed water supply to get this map surrounded by water again. So that was a very very strong incentive, in fact I started doing calculations on the water supply before I did anything else. 91

In his end of year 2015 report, Keith draws a few short, but telling conclusions of "lessons learned" throughout the year:

- Expressions of Interest do not necessarily convert to useful help.
- Grant aid bureaucracy is not to be underestimated.
- Don't be too prescriptive with budget plans and objectives when project costs have large uncertainties.
- Recognise financial priorities.
- Choose trustees with personal commitment to the project. 92

While statements of support for the Map (both cultural and financial) were many, a continued shortage of volunteer labour was problematic. Such a realisation illustrates the necessity of 'ground-up' heritage projects to be continually driven by a core group of dedicated and enthusiastic volunteer advocates such as Mapa Scotland, without whom, momentum and direction is likely to dissipate.

2016: Further Milestones

By the close of 2016, the Map's foundations had been fully reinforced with the application of approximately 50,000kg of frost resistant concrete and mortar. Where foundations had to be rebuilt from scratch, the same system of vertical shuttering and infilling (with a concrete and aggregate mix used during the Map's original construction) was adopted. With foundations in place and the Map stabilised, the considerable task of repairing the extensive damage to the Map's more detailed topography could begin. A further milestone was attained in 2016 with the design and installation of a new and improved viewing tower at the southern end of the Map, providing an elevated vantage point and focal point for visitors, all at an impressive scale-altitude height of 48,000 metres. At this stage of the restoration, Mapa Scotland had effectively met the primary expectations of their grant providers, sponsors and supporters to renovate the Map to a better condition than when it was 'abandoned' in the 1980s. Having completed the major works, the question to be addressed was at what point

should the Map's restoration be considered complete? Additionally, what was the best means to secure its future beyond the completed objectives of Mapa Scotland, a question Keith Burns addressed in his end of year report:

It remains to complete crack sealing and improved detail to the topography. Longer term aspirations include painting and supply of water to the heads of the major glens. We are often asked "when will you finish it?" There is no simple answer because there is no clear end point when you could carry on adding detail for ever at finer and finer scale. The purpose of a map is to provide a simplified representation of reality for a purpose defined by the user. Our visitors want more and more detail. The reality is that even to preserve what we have will need effort to offset the effects of weather and slow degradation. The Mapa Scotland volunteer force is very small, with an ominous age profile. This project now needs a new injection of constructive engagement by local community groups to look after this globally unique and valuable monument.⁹³



Figure 68: Topographic re-sculpting on the Isle of Lewis, March 2017 (*Image: author*)

2017 - Moving Mountains

Although the topographic repair and re-sculpting of the Map had begun in late 2016, this labour-intensive and slow task carried on throughout 2017 (see Figure 68). As Keith Burns notes above, this was a task with no clear end-point due to the potential of adding finer levels of detail and 'accuracy' to the Map's topography. Despite this potentially perpetual task, a logical stepping-off point was reached with the completion of repair to the Map's existing topography and the re-sculpting of areas that had degraded completely, including the majority of the Inner and Outer Hebrides. In total, the repair to the Map's foundations and surface topography undertaken by Mapa Scotland amounted to the addition of 14,000 litres of concrete and mortar, with a combined weight of 34 tonnes – a mass equivalent to a concrete block measuring 2.4m x 2.4m x 2.4m. 94

Having completed these surface topographic repairs, discussion turned towards the finishing touches of painting the Map, which as well as improving its aesthetic appearance (which at this stage was a somewhat 'messy' patchwork of various hues of old and new concrete), would also provide a degree of protection from the incessant weathering which had caused its ruination in previous decades. The capstone nature of the Map's painting, signalling an end to the possibility of any further bulk topographic work, raised concerns among the team about whether the job was indeed, 'finished', with some areas, it was felt, still lacking in detail. In his response to these concerns, project manager Keith Burns noted that having completed the majority of the Map's missing topography, further minor details would likely go unnoticed, and the logistical reality that further work would require further resources:

Further sculpting after the painting. This is possible by discrete patching and re-painting where there's a need for additions. Over the past few months the following priorities have been cleared: N. Uist, Harris, Lewis, Benbecula and islands, Skye, Mull, Arthurs Seat, N Berwick Law, Traprain Law, Coll, Tiree, Cumbrae, and many others. Anyone with other particular priorities has 3 weeks remaining before the paint contract is ready to start. From my own experience, I suspect that 90% of visitors need help to discriminate between Ben Lomond and Ben Nevis anyway. So additional detail is mainly for topographic anoraks like us. Future patching in of extras would need volunteers and further money.⁹⁵

These discussions over the need for further topographic detail serve to remind that the Map's original makers were not seeking to create a 100% topographically accurate 'map' of Scotland, but rather a sculptural model that evoked an impression of Scotland's landscape. The subsequent discussion among the restoration team as to what colour to paint the Map is

illuminating, with a variety of opinions offered about whether the Map should function like a sheet-map (with various topographic features delineated), or more of a sculptural model. Essentially, debate ranged between whether to paint the Map in the tradition of a relief map (with various colour hues used to delineate altitude and profile and topographical features such as rivers and lochs), or to paint it in a uniform colour instead, to highlight its sculptural qualities and the natural play of light across its topography. Though opinions differed, agreement was reached among the team that 'less is more' and that the latter option was preferable. Of the colour palette under consideration (including brown, green, and blue), a tone of light-grey was chosen as the preferred option: subtle enough to accentuate the Map's topography and judged as not too 'lurid'. These subjective discussions within the team regarding the best way to embellish and 'display' the Map's 'spatial information' to the visiting public reminds that rather than aiming to "present the world directly and transparently. Maps re-present the world by providing versions of truth for the human mind to apprehend" (Montello 2002: 283). In the Map's case, the version of the 'truth' that it seeks to convey is an impression of Scotland's extensive mountainous landscape through a 5:1 vertical exaggeration. Though carrying with it a range of topographical inconsistencies, as Keith Burns notes above, such errors go largely unnoticed except by those who have worked, up-close and intimately within the Map's miniature landscape, and that the overall 'affect' of the Map is undiminished.

After a number of contractors inspected and declined the job due to its unusual nature, appropriately enough, it was an Edinburgh-based Polish building contractor, Polwork UK, who secured the tender to apply these all-important finishing touches to the Map's surface. Expressing their enthusiasm to be involved in a Scottish-Polish heritage project, the company's Polish identity, ownership and workforce was considered by Mapa Scotland as a guarantee that the job would be undertaken thoroughly and with care. With its surrounding seas drained to provide drier working conditions, the final stage of the Map's restoration was undertaken by Polwork over a five-week period across September and October 2017.

Before painting could begin, the small Polwork team had to apply water-retardant sealant to hairline cracks criss-crossing the country, too small to repair with mortar. Having stabilised the Map's surface, the men set about applying three separate coats of vapour permeable paint. Despite the unpredictable weather of autumn, work was completed on time (see Figure 69). In effect, the painting of the Map in late 2017 represented the completion of the

restoration of the Great Polish Map of Scotland - a task which had taken approximately four years of sustained and co-ordinated labour, notwithstanding the years of campaigning and advocacy required to begin the restoration after the initial founding of Mapa Scotland in 2010. Almost forty years after its initial abandonment in 1980, the Map was in a better and more advanced condition than it was following its original construction. Not least due to the fully circulating seascape, established and functioning for the first time. With the addition of a viewing tower, perimeter fence, surrounding pathway, information panels, directional signs and visitor benches the Map was also newly equipped to function as a visitor attraction and historic site. Furthermore, cultural awareness of the Map was now far more widespread due to the wider work of Mapa Scotland in promoting its educational potential (via a series of illustrated talks and tours), in the media (through the group's Facebook page and numerous news articles) and publicly (through the distribution of over 10,000 Polish and English information leaflets throughout the Borders and East Lothian). The reach of, and public interest in, the Map was captured by a short film explaining the Map's history and restoration produced by BBC Scotland titled 'The hidden map of Scotland', which since featuring on the organisation's Facebook page in October 2017 has been viewed 4.1 million times, and attracted approximately 3.100 'comments'. 96



Figure 69: The painting of the Map by Polish contractors Polwork UK, signalled the completion of its four-year restoration (*Image: Mapa Scotland*)

Heritage landscaping: 'the concrete garden'

Having provided a general overview and timeline of the Map's restoration, this section turns to consider the experiential aspects of the restoration as a process of situated heritage landscaping, drawing upon my participative research as a member of the labouring taskforce. I also consider how the Map evokes and 'recruits' the Scottish landscape more broadly, acting as a backdrop upon which individual maps of memory are traced as well as broader feelings of national belonging and attachment.

My hands-on involvement with the Map took place across several working parties between July 2016 and February 2018, with the majority occurring during the rebuilding phase of the Map's foundations and topography. This sustained period of fieldwork allowed me to experience map-work across the seasons and in contrasting weather conditions, with all its vagaries and nuances becoming apparent through repeated encounter.

When reflecting upon my experience of working parties at the Map, the journey to it from Glasgow via Edinburgh provided an important frame of reference – a sense of journeying from one place, quite removed from another. Travelling south along the A708 from Edinburgh either by bus or car, past the small commuter town of Penicuik, the bustle and bitumen of the commuter belt gives way to the open valleys and rolling green hills of the Scottish Borders. Upon reaching the small village of Eddlestone, the A708 is left behind. An old stone bridge allows passage over the small burn of the Eddlestone Water to reach the long driveway of the Barony Castle Hotel. Quietly removed from the life of the village, the grounds of the hotel speak of its history as a seat of familial power and defence during the historic age of the Border Reivers. Walking up the gentle slope of the driveway, fields give way to a picturesque scene composed by the manicured lawn of the hotel and stands of deciduous trees, punctuated by the distinctiveness of the whitewashed hotel and its corner towers appearing within the frame of its wrought iron gateway. Part-way between a castle and baronial mansion house, it dates back to the early sixteenth century when John Murray of Fallahill was granted the estate by King James IV.97 A Polish White Eagle appears above one of the hotel's front windows hinting at its more recent cross-cultural past. The view facing the hotel is one typical of the Borders: the broad slopes of Milky Law, Greenfield Knowe and White Barony drawing down to the pastoral landscape of the river valley below (see Figure 70). The visitor is struck by the contrast of open space, clean air and quiet: a

sense of having travelled to an altogether different place where time moves slower, meandering rather than motoring. Indeed, the location of the Map, off the beaten track in a quiet corner, affords it a sense of mystique – as if it has emerged from the landscape, as opposed to something designed or imposed upon it.



Figure 70: The pastoral view of the Scottish Border landscape from the hotel's driveway (*Image: author*)

The Map nestles to the south of the hotel, the steep gorge of the Fairy Dean Burn and dense woodland almost entirely obscuring it from view during the approach. Upon crossing the gorge on an old wooden bridge, with an abandoned moss-covered waterwheel upstream accentuating the sense of the pastoral, a clearing in the trees is reached. The site has the feel of a woodland glade, a place removed and enclosed, as if a threshold has been crossed. It is only when a few short strides away, having surmounted the sloped banking that the full panorama of the Map suddenly comes into view – a special effect, and big reveal, akin to the landscape trickery of an eighteenth century ha-ha.

The pair of garden sheds erected for the Map's restoration and maintenance sit unobtrusively within this scene at the head of the Map, with the 'site-office' located under the sheltering boughs of an old oak tree. Humble in nature, the garden-sheds were pivotal places during the Map's restoration. Located at the Map's side, they signalled the residency of a community of interest and the setting-up of camp. As well as providing a convenient shelter to change into work clothes and wellies, the shed acted as an important gathering point during lunch breaks and an all-important 'howff' for brewing-up and conversation. As well as these practical affordances we might also consider the garden-shed as a totem, signalling the gregarious nature of working parties and the Map's ground-up restoration by a small group of friends and like-minded individuals gathered around a shared task of 'landscape gardening'. Indeed, as a group composed almost entirely of retirees, we might consider the Map and its shed as a rather spectacular alternative to a garden allotment, providing a mental and physical retreat from the expectations of day-to-day life.

The majority of the working parties I attended occurred during the re-sculpting phase of the Map's foundations and its surface topography, allowing an up-close and haptic experience of the Map. Gatherings took place twice a week (weather permitting), on Thursdays and Sunday, with priority jobs and a brief weather forecast identified by Keith beforehand via email (see below).⁹⁸ Though the number of participants at working parties varied, they tended to number between four and six individuals.

Sun and showers.

- 1. Clear covers from recent sculpting.
- 2. Clear away stones on map.
- 3. Sculpting and patching depending on showers (Harris, Lewis, N Uist.)
- 4. Check intake filter for silt after heavy rains.
- 5. Check security of overflow pipe in ravine.

Keith

As opposed to the visual encounter with the Map afforded to visitors today, working amongst its complex of concrete topography provided me with an embodied appreciation of its material qualities, and a 'view from within'. Access to the Map's sunken structure was by two gateways in its surrounding perimeter fence, one located at the southern end of the Map

below the Scottish Borders, with the other at its northern end above the Outer Hebrides. The isles of Lewis-Harris offered a convenient landing point for building materials, with a ramp emplaced between its shores and the perimeter wall allowing deliveries of mortar to the requisite spots via wheelbarrow (see Figure 68). With the Map's seas drained for practical ease, a series of paving slabs set into 'The Minch' allowed workers access to the mainland without sinking ankle-deep into a seabed of mud and sodium bentonite clay. Having descended into the pit and onto the landmass, perhaps the most striking impression was of its size, as waves of mountain peaks ranged off in every direction (see Figure 71). Indeed, down at sea-level, without the benefit of elevation, it was difficult to place where exactly in Scotland one might be standing, though the towering summit cliffs of Ben Nevis often provided a handy visual reference point.



Figure 71: The Map's sprawling concrete topography. Note Ben Nevis in the upper left of the image, marked by a pole (*Image: author*)

To navigate this working landscape safely, I had to learn how to move efficiently across its deeply incised concrete surface, hopping from peak to peak, avoiding any slips and the risk of ankle-sprains. Due to the undulating and uneven terrain of the Map, walking boots were a wise choice of footwear, offering protection for vulnerable ankles and good purchase on coarse concrete. As jobs were often most practically undertaken on hands and knees, protective kneepads and gloves were a must, offering relief from rough concrete bedrock.

One of the major jobs completed while I was a member of working parties was the rebuilding of various portions of the Inner and Outer Hebrides. As opposed to the finer touch required for topographic re-sculpting, the construction of sea-level foundations was a physically demanding task. I hefted concrete and aggregate into place behind coastal shuttering. The steady burl of the cement mixer was the signature sound for a working landscape. These earthworks aside, for the majority of the Map's restoration, work was characterised by makedo-and-mend. Cracks, fissures, faults and rifts in its concrete landscape were re-laid and resculpted with mortar. Due to the fact that eroded areas were effectively the same colour as the surrounding surface, identifying areas in need of repair could be a tricky exercise in itself, requiring an attentive, surveying eye. Once identified, points of erosion were circled with bright spray-paint to distinguish them from the surrounding landscape and mark them out as jobs to be completed. Generally, we would locate a working spot for the day by identifying a region with eroded features. After a suitable location was found for re-sculpting, initially the spot had to be swept clean of debris then wetted to allow the mortar overlay to bind more effectively. This preparatory pouring of water onto the Map's landscape had the pleasing effect of suddenly revealing its micro-fluvial systems, with water quickly finding the path of least resistance to the myriad gullies, rivers and runnels that were shaped by the fingers of its creators. Hunkered down for the day, we would steadily work through each erosion feature, following the flow of river valleys and the contours of the hills to reconstitute flood plains and hillsides.

After the area was cleaned and cleared, a hand trowel was used to apply an approximate amount of mortar to any fault, fissure, hole or void. The mortar was patted down and smoothed into the pre-existing feature. At work I had to be attentive to the surrounding landscape at this stage, ensuring that any intersecting topographic details were continued seamlessly into the repair, with a little license for creative interpretation. This intuitive and interpretative geo-sculpting offered glimpses into the Map's original construction as its

creators sought to reproduce a landscape formed from millions of years of geological processes, only with quick, deft movements of shaping hands and fingers. With the correct ratio of water, sand and cement, a good batch of mortar was pleasingly workable and bonded well, even to steep mountainsides. Finishing touches were applied with a wet paintbrush which was used to smooth, blend and contour the mortar into the landscape, though like an artist in search of perfection it was sometimes difficult to know when to stop (see Figure 72). Once completed, fresh areas of mortar were covered with tarp and held down with stones, to prevent rainwater from interfering with the chemistry of binding and drying. Once the tarps were removed, the light grey tones of dried mortar contrasted pleasingly with the darker hues of its weathered surroundings.

As I gradually worked my way south along the Mull of Kintyre during repeat visits, surveying, repairing and rebuilding, it was satisfying to see the result of my labours set out before me (see Figure 73). Working up close revealed the materiality of the Map's organic and non-organic landscapes; of leaf fall gathered in lochs and glens, grey concrete offset by the deep blue of its surrounding waters, discarded bird-feathers and fallen berries (see Figure 74). Working on hands and knees, I often found myself growing quite attached to my wee bit hill and glen and slipping into a kind of dreamy topophilia, imagining how a miniature version of myself might navigate through the vast concrete landscape. The Map's miniature landscape invites this sense of spatial playfulness, satisfying the childlike compulsion to imagine small objects as massive ones; whereby a stone becomes a vast rock face to be scaled, a sandpit becomes a super quarry, or a small patch of garden lawn a virgin prairie yet to be crossed. From the perspective of the miniature, the Map becomes a vast, unmapped wilderness to be explored, an expanse of river valleys, rolling foothills and precipitous mountains (see Figure 75). Indeed, for non-human lives that exist at a smaller scale the Map is a living environment unto itself, with insects and birds to be found among its peaks and valleys. Its waters too, provide a habitat for water snails and newts, as well as a hazard, as a drowned rabbit and mouse plucked from the chill waters of the North Sea attest.



Figure 72: Repairs worked into surrounding topography, somewhere in the Scottish Borders (*Image: author*)



Figure 73: Repairs on the Mull of Kintyre with lighter hues of dried concrete evident (Image: author)



Figure 74: The material milieu of the Map (*Image: author*)



Figure 75: The Map from the perspective of the author in miniature (*Image: author*)

When caught up in my miniaturised reveries, an uncanny slippage of geographical scale would often occur: glancing up suddenly from my work deep in concrete glens, to then look upon the surrounding fields and onward to the broad slopes of the Meldon hills, visible through a gap in the Map's surrounding veil of trees. While sometimes engaged in conversation with a colleague nearby but often focused on my own little patch and the work in front of me, landscape became "taskscape", with time a matter of the changing light and weather than ordered seconds and minutes (Ingold 2000). Indeed, the mood of the Map was often determined by the changeable weather conditions, with overcast skies flattening its grey landscape while a sudden burst of sunshine would suddenly cause it to come to life as light and shadow brought topography into brilliant relief. The appearance of rain would call a temporary halt in proceedings, with fresh mortar hastily covered over with tarpaulins before a retreat to the shelter of the shed and the welcome warmth of a brew. The result of these focused rhythms of work, the sounds of the wind in the trees and birdsong, the burbling of water from the inflow pipes and the conversation of colleagues drifting across the Map created a situated sense of wellbeing, and a realisation that although it was in miniature, the Map was big enough to constitute a landscape with a distinct sense of place, around which a community of care, practice and expertise had assembled itself (see Figure 76). As a form of 'concrete gardening', comparisons can be drawn to the powerful sense of 'being', or "practical ontology", engendered by the repetitive, but caring activities of allotment gardening (Crouch 2003: 18), where the "unremarkable labour and physical proximities of gardening...have a remarkable currency for the individual subject" (Lorimer 2005: 85).

An excerpt from my field notes illustrates the sense of wellbeing and situated emotional investment that working on the Map engendered:

19/04/17 - Seventh working party w/ Keith, Dave, Jim, Trevor, Lyn. Productive day at the map, overcast at first and then bright sunshine late afternoon. Only arrived at midday but work continued until around 16:30. Nice lunch sat outside on the picnic bench, discussed my upcoming trip to Krakow. Helped Keith remove paving slabs from sea. Lots of freshwater snails on the slabs - a living environment! Spent the rest of the afternoon re-sculpting with mortar. Completed Mull of Kintyre. Nice to see areas I'd re-sculpted from previous visits. Almost a sense of ownership over the area as I'd spent hours working there. Spoke with two women who were visiting the map for the first time. Discussed history of map and the long-standing relationship between Scots and Poles. One of them commented on the fact the map highlights just how mountainous Scotland is. Enjoyed sculpting in the sun around Borders area. High level of detail on hills and gullies which require care and interpretation - a sense of surveying areas before working on them. Prep of wetting and brushing. Felt very attuned to the sounds around me - conversation between the rest of the team, the wind blowing in the trees, bird song, woodpecker drilling, peacock, sheep, the therapeutic sounds of the water burbling from

the inflow pipes. Sense of the wider Borders landscape in which the map sits, particularly the rolling hills and clouds - weather worlds. A lot of conversation today using the map as reference, Keith commented that he could identify the hill race route up Tinto hill and the impressive level of detail in certain areas of the map. The map is a site, scene, backdrop, upon which individual mental maps and experiences are drawn.

As my field notes indicate, the node around which the Map's community of practice assembled was that of landscape. As a collective of lifelong hill-runners, walkers and climbers, during working parties the Map's miniature Scottish landscape would often act as a proxy for the real thing, serving as the backdrop, and catalyst, for previously accrued embodied knowledge and the recollection of (mis)adventures in the Scottish mountains. For instance, in a discussion with Graham about the many new climbing routes he'd established on Islay, he invited me to accompany him sometime, pointing out the location of his holiday home on the Map's miniature version of the island, while in another exchange Keith utilised the Map's representation of Tinto Hill to describe the route of its annual hill race. In conversation with visitors too, discussion would be drawn towards individual experiences of the Scottish landscape with personal memories mapped onto the concrete facsimile, actions echoing Merleau-Ponty's observation that landscape is not so much the object as "the homeland of our thoughts" (in Ingold 2000).

Just as landscape phenomenology provides a valuable conceptual framework for understanding how landscape emerges through practical activities such as climbing and hill-walking, it can also be used to frame my experience of working on the Map as a literal and figurative act of heritage landscaping, where "landscape becomes the close-at-hand, that which is both touching and being touched, an affective handling through which self and world emerge and entwine" (Wylie 2007: 67). In this sense, participating in the hands-on restoration of the Map allowed me to get closer to the embodied experiences of those who worked on its construction in the 1970s, for whom the map was a tactile and material reality, an experience of changeable weather, hard-work, sore bodies — a practice and process of dwelling, and "an embodied act of landscaping" (Lorimer 2005). As Jeffrey considers of the "aura" of material vestiges such as the map: "A key aspect of the aura is that sensation of being close to the past. This sensation, the thrill of proximity, is not essentially about the physical object itself, it is about the people who have been close to it in the past and our connection to them" (2015: 147).



Figure 76: The "taskscape" of a typical working party at the Map. From L to R Keith Burns, Jim Barton, Nick Macdonald, Dave Peck (*Image: author*)

The Map as monument

Having considered the 'work' of heritage landscaping by which the Map was reconstituted as a 'new' heritage object, I now turn to consider its representational, visual and symbolic currency as a historic monument. Just as Wylie (2007) considers landscape as a form of productive "tension", there is, I will concede, something of a tension between the visual and tactile qualities of the Map. Though landscape phenomenology and associated notions of dwelling provide a useful conceptual means of understanding my situated, tactile experience of the Map as a member of the restoration team, it is an object that is designed to be gazed upon, rather than touched. Though the smells, sounds and 'feel' of the Map's site all amount to a multi-sensual experience for the visitor, touching and walking upon its concrete landscape are not possible; or at least strongly discouraged by its perimeter fence. As Johnson notes, heritage tourism "has long privileged the visual, the performative and the spectacular for popular consumption" (2015: 164). Having considered the Map phenomenologically, I now turn to its more visual and symbolic qualities that are front-and-centre in its ongoing life as a sanctioned heritage site.

As Waterton and Watson state, "heritage is a version of the past received through objects and display, representations and engagements, spectacular locations and events, memories and commemorations, and the preparation of places for cultural purposes and consumption" (2015: 1). In this sense, we can consider the Great Polish Map of Scotland as an object through which a version of the past is received – that is, of the long standing relationship between Scotland and Poland since the sixteenth century, and in particular the role of Poles in Scotland during and after World War II, and their ongoing contribution to the economic and cultural life of the nation thereafter. However, this particular discourse was only enabled by the Map's official recognition as a part of Scotland's heritage fabric (via its Category B listing by Historic Environment Scotland), and its restoration by Mapa Scotland.

In effect, the physical restoration of the Map, the installation of a 'historic' directional sign, perimeter fence, viewing tower and interpretation panels amount to a means of preparing the Map "for cultural purposes and consumption" (Waterton and Watson 2015: 1). Without the restorative campaign of Mapa Scotland, the Map would likely still lie in ruin, with its story fragmented and forgotten. Such an outcome illustrates the fact that people must "work" to produce the relationships to the past that constitute heritage, with these relationships

"characterised by a reverence and attachment to select objects, places and practices that are thought to connect with or exemplify the past in some way" (Harrison 2012: 14).

The completion of the Map's restoration was officially celebrated on the 12th April 2018, with a formal opening ceremony held at the Barony Castle Hotel. Organised by the Scottish Government and the Consulate General of the Republic of Poland in Edinburgh, various Scottish and Polish Government representatives were in attendance as well as approximately eighty individuals affiliated with the Map, including family members of Jan Tomasik. I attended the ceremony by invitation, both as a member of Mapa Scotland and a representative of the University of Glasgow. An interpretation of the ceremonial aspects of the occasion provides insights into the symbolic heritage properties newly afforded to the Map by its listing and restoration, as well as its cultural utility as a monumental backdrop for the celebration of Scottish and Polish cultural exchanges in the past, present and future (see Figure 77). As Hall notes, the sanctioned conservation of heritage objects such as the Map provide "a powerful source of meanings which give the abstract idea of nation its lived content" (2008: 220 in Klekot 2012: 462).



Figure 77: The Map as cultural symbol and monument. Invitation for the formal opening of the Great Polish Map of Scotland on the 12th April 2018 (*Image: Author*)

The programme for the Map's formal opening ceremony centred around a series of speeches celebrating Scottish and Polish cultural links, delivered by representatives of the Scottish and Polish governments: Ms Fiona Hyslop MSP, Cabinet Secretary for Culture, Tourism and External Affairs; Dr Arkady Rzegocki, Ambassador of the Republic of Poland to the Court of St James, Ireneusz Truszkowski, Consul General of the Republic of Poland in Edinburgh; and, due to the wartime history of the Map, Mr Jan Jozef Kasprzyk, Head of the Office for War Veterans and Victims of Oppression.

Following these speeches, Dr Tomasz Trafas (brother of the Map's designer Professor Kazimierz Trafas) spoke more specifically on the history of the Map's genesis and construction, followed by Dr Malgorzata Luc, a representative of Professor Kazimierz Trafas' former geography department at the Jagiellonian University with whom I had established contact on a research trip to Krakow. Finally, Keith Burns, Mapa Scotland's project manager, provided an overview and slideshow of the Map's restoration, before Ms Marta Pilarska of Historic Environment Scotland described the digital documentation of the Map which took place via laser scanning in August 2017.

In recognition of their work, the core members of Mapa Scotland were formally awarded the Pro Patria Medal of Poland by Mr Jan Jozef Kasprzyk, Head of the Office for War Veterans and Victims of Oppression. The medal is awarded to mark acts of special merit in strengthening and treasuring the memory of the Polish people's fight for the independence of the Polish Republic during and following World War II. This highly symbolic and ceremonial gesture illustrated the manner in which the Map has come to serve as a proxy for the wartime folk history of Polish troops in Scotland both during and after the war, with its restoration seen as a renewal and strengthening of these folk histories. Indeed, the association of the Map with the esteemed General Maczek, further heightens this sense of military service and sacrifice, particularly as Maczek was subsequently stripped of his Polish citizenship by the People's Republic of Poland. The wider cultural timeline into which the Map's opening ceremony was located was the 100th anniversary of Poland gaining independence in 1918, and a series of celebratory events taking place throughout 2018. Such an outcome illustrates the manner in which heritage objects are recruited for the promotion of the nation, or in the Map's case, two nations. As the Polish Consul General, Ireneusz Truszkowski stated during his speech:

We are delighted to be able to officially unveil the restored Great Polish Map of Scotland in the same year in which Poland is celebrating its 100th anniversary of regaining independence. The map has a great potential and I hope it will be used also for educational purposes that will benefit current and future generations of Scots and Poles, increasing the understanding of our common history. ⁹⁹

Following these formalities, the opening ceremony concluded with a visit to the Map itself, with its concrete landscape providing the scenic backdrop for formal photos and media interviews (see Figure 78).



Figure 78: The official opening of the Great Polish Map of Scotland with the Map providing a photographic and symbolic backdrop (*Image: author*)

Though the Great Polish Map of Scotland exists as a unique monument to the folk history of Poles in Scotland during and after the war, it is important to set it alongside other examples of Scottish-Polish monumentation. For instance, in the Border town of Duns where members of the 1st Polish Armoured Division were stationed during the war (conducting military exercises on the Berwickshire moors), a war memorial was unveiled in 1981 commemorating the presence of the division and those that died in combat. ¹⁰⁰ The unveiling was conducted by the division's former CO General Maczek. Moreover, in 2016 a statue of Wojtek the Soldier Bear was gifted to the town of Duns from its twin-town of Zagan in Poland. ¹⁰¹ Adopted by Polish troops when serving in the Middle East, Wojtek the Soldier Bear was trained to carry heavy ammunition and 'served' during the battle of Monte Cassino

in Italy. After the war Wojtek was billeted at an army camp in Hutton in Berwickshire before demobilisation saw the bear relocated to Edinburgh Zoo, where he stayed until his death in 1963. A bronze memorial statue was also erected to Wojtek in Edinburgh's Princes Street Gardens in January 2017 as a monument to Polish veterans and the displacement of people caused by the war. As Helena Scott of the Wojtek Memorial Trust stated of the statue's erection:

For those born of Polish parents, the unveiling is particularly poignant because we represent a generation that bridges between those post-war Poles who settled in Scotland and the younger generation, those that have made Scotland their home in more recent years. Wojtek's story has enabled us to come together and to span a history of some 70 years of post-war Polish Scottish relations - to celebrate but also to commemorate. ¹⁰²

As in the case of the Map, a wartime monument is used to recognise not just those Poles that settled in Scotland after the war, but also those who have made Scotland their home since the accession of Poland to the EU in 2004 (Dietkow 2011). On November 3rd, 2018, a lifesized bronze statue of General Maczek in military uniform was unveiled outside Edinburgh's City Council Chambers on the Royal Mile to commemorate his wartime service and postwar life as an Edinburgh resident, as well as Polish troops in Scotland more broadly (see Figure 79). In a campaign initiated by the late Lord Fraser of Carmylie in 2013, public donations and financial aid from the Polish government met the £85,000 cost of the statue's creation. 103 In effect, these recent additions to Edinburgh's memorial landscape evoke the folk-history of wartime (and post-war) Poles in Scotland for the present-day cultural purposes of 're-remembering', providing a tangible link between the post-war generation and more recent Polish immigrants to Scotland. A component of this memorial language is the promotion of Scotland as an outward-looking, welcoming and cosmopolitan European nation that recognises the contribution of immigrants to its cultural and economic life -acultural narrative that also reflects the dominant political paradigm of inclusivity, as well as the discourse of the SNP-led Scottish Government in promoting Scotland as a forwardlooking, modern nation in which cultural diversity is celebrated. 104



Figure 79: The recently erected statue of General Stanislaw Maczek located outside Edinburgh Council Chambers (*Image: Edinburgh Spotlight*)

From Concrete to Code: The Map made digital

The exercise of laser scanning the Map to produce a 3D digital facsimile is reflective of the increasing use of digital technologies such as photogrammetry and 3D printing in heritage practice, as a means of recording and 'disseminating' historic objects and archaeological sites to broader audiences (Jeffrey 2015). With the Map, the data generated by its laser scan was used to create an interactive digital 3D model annotated with information on the Map's origins as well as examples of historical and cultural connections between Scotland and Poland (see Figure 80). Though the Map was laser scanned in minute detail, the 3D model itself was designed with dissemination of the Map's broader symbolism and community engagement in mind, with graphical fidelity sacrificed to allow for easy accessibility. Launched online (via the Sketchfab website) on the same day as the Map's official

opening, ¹⁰⁵ it has since received 3,100 'views', showcasing the potential for appropriately designed digital heritage visualisations to engage broader audiences and challenge "the tyranny of a purely technical engagement with digital objects" within heritage practice (Jeffrey 2015: 148). This digital 3D counterpart to the 'real' Map is indicative both of its cultural symbolic utility, as well as the manner in which digital technologies are utilised to mobilise otherwise, situated historic monuments. Though questions regarding authenticity abound (Jones et al 2017), such digital proxies negate the immovability and geographical rootedness of monumental objects, allowing them to be accessed by broader audiences regardless of geographical location. In a sense, we might consider the Map's digitisation as the final destination in its journey from forgotten ruin, to enshrined heritage object. A transition from the analogue realm of its creation into the digital world of the twenty-first century, which so defines cartography (and increasingly heritage) today - its tactile, concrete materiality made pixel for contemporary cultural celebration and perhaps even, future preservation.

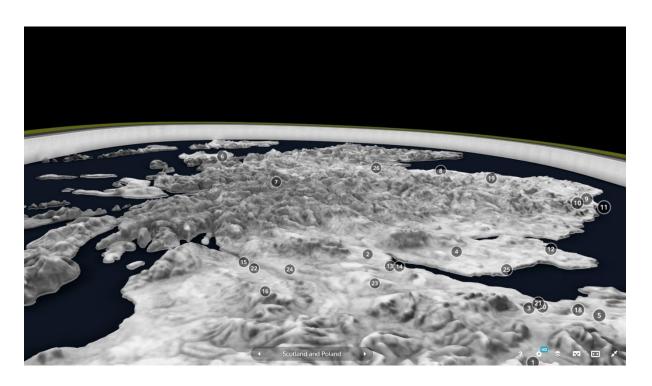


Figure 80: Screengrab of the digital version of the Great Polish Map of Scotland as featured on the Sketchfab website. The numbers on the Map can be clicked to reveal various fact regarding historical links between Scotland and Poland (*Image: HES*)

Landscape and nation

As these instances illustrate, the Great Polish Map of Scotland is one among a number of regional monuments to Scottish-Polish heritage in the Lothians and Scottish Borders. As opposed to more conventional modes of monumental language however, the Map can be distinguished not only by its unusual form, but also by the fact that it was re-imagined and re-tooled as a historical monument from a state of ruin. In this sense we might consider the Map as a monument by coincidence, rather than design, and one that emerged initially from the 'ground-up', as opposed to the sanctioned design and installation of the majority of historical monuments, particularly within the regulated spaces of cities.

While conventional realist and figurative historical monuments are often quite prescriptive in their cultural meaning, leaving little scope for alternatives (Harris 2011), it is my contention that the Map's metaphorical and literal memorial landscape offers more 'potential points of connection' to observers and is thus more open to individual interpretation and meaning, alongside its authorised narrative as a testament to Scottish-Polish folk histories. The Map functions not only as a monument, but also as a form of sculptural land art inviting subjective and individual interpretation. In its impressionistic evocation of the Scottish landscape, the Map is a powerful means for individuals to attach meaning to, particularly as landscape plays such a central role in the performance of Scottish national identity (Withers 1992). As Harvey states, "interrelated elements of landscape and heritage reside within every society's relationship with its past" (2015: 911), with landscape or 'country', providing the canvas upon which historical events have been played out and remembered by subsequent generations. In its impressionistic portrayal of the entirety of the Scottish landscape, the Map presents the observer with a potent emblem of the 'nation' in material form - with Scotlands, and by mutual association, its past:

...a cultural memory of 'national past' is literally con-joined with specific iconic topographical reference points in a taken-for-granted, self-fulfilling and mutually supporting sense of heritage landscape. At once, both emblematic of the imagined community of the nation, as well as the solid entity of the nation-in-physical-form, the double meaning of 'country' is celebrated through a sense of heritage as a contemporary product perceived through notions of the past (Harvey 2015: 911).

As well as evoking the imagined community of the nation, the Map also provides a potent backdrop upon which individual meanings and knowledge of the Scottish landscape can be traced. This is in large part due to the aesthetics of the Map in accentuating the mountainous nature of the Scottish landscape via the 5:1 exaggeration of its vertical scale. Due to this exaggeration in height, the Map presents the nation in essence, as a highland one, with even the rolling hills of the Borders and the Southern Uplands appearing mountainous to the observer, with the Highlands themselves near-enough alpine in appearance and stature. In this sense the Map's rugged representation of Scotland offers a physical manifestation of Lorimer's cultural observation that "the Highlands have become the quintessential Scottish landscape, the nation defined in geographic form" (1999: 517).

The primacy of a highland landscape within the national (and individual) consciousness is played out during the popular leisure pursuit of 'Munro-bagging' which often forms the basis of individual knowledge claims to Scotland's geography, "while affording a grounded point of connection to historical events", and a "sense of presence within a national space" (Lorimer & Lund 2003: 134). As mentioned, during working parties the Map would often provide a backdrop to recollections of days spent among the Scottish mountains – embodied knowledge gained via walking, climbing, fell-running and mountaineering. For visitors too, the Munros often provide a point of reference, gleaned in the discursive manner in which visitors try to orientate themselves, with reference to particularly notable peaks (see Figure 81). For those to whom the Munros provide a meaningful abstraction of Scotland's landscape then, we can see how it may present itself as a giant 'Munro-map', with the concrete landscape coloured and filled with the kaleidoscopic memories of days spent in the hills – of sensations, scenery, weather, conversations and company, as well as summits ticked-off.



Figure 81: Visitors gathered at the Map's viewing tower survey its concrete landscape, March 2017 (*Image: author*)

With regards as to how the Map is perceived by visitors as a tourist attraction and heritage site, its associated TripAdvisor page offers a useful data source. ¹⁰⁶ To date, the page contains 211 'reviews' of the Map written between 21st August 2014 and July 2019 providing an insight into various perceptions of the map during its restoration, and since its completion in October 2017. The hundreds of reviews posted on the Map, evidence a range of subjective responses, ranging from rejection – "It is a pile of old concrete nothing to look at, certainly different to the photos that are displayed of it" (21st June 2016) – to impassioned wonder – "Absolutely stunning landmark, within beautiful surroundings painstakingly being restored. We will never tire of visiting here to look at this beautiful feature." (6th March 2018). Of the total tally, 80 users rated it as 'Excellent', 68 'Very Good', 46 'Average', 8 'Poor', and 4 'Terrible'. Notably, the TripAdvisor platform identifies a selection of key words or phrases that occur repeatedly through visitor responses, with the Map's listed as: "viewing platform, barony castle, worth a visit, great polish, restoration work, piece of history, interesting history, hotel grounds, information boards, walk around the grounds, lovely woodland, former glory, adjacent hotel, world war, relief map, hidden gem, german invasion".¹⁰⁷

Though responses vary in length, detail and register, as the "word-cloud" indicates, key themes or responses are apparent, providing a quick indication into how the Map is perceived as a sculptural, monumental object and visitor attraction. First, many respondents state that the Map is a 'must-see' if staying at the Barony Castle Hotel or if passing through the area but is not worth a visit specifically: "Not really worth making the trip here especially to see it - it's another matter if you're in the neighbourhood anyway or passing, then by all means, go check it out. Otherwise I'd give it a miss." (28th May 2018). Rather than operating as a tourist attraction in and of itself then, the Map is perceived as an "interesting diversion" (22nd May 2018) adding value to a stay at the hotel or a walk around its grounds and wider landscape, with several reviews commenting on the wider setting of the Map within the "beautiful" and "stunning" setting of the hotel grounds and its views of the Borders landscape (11th May 2017).

For some visitors, it is apparent that the Map holds interest primarily as a 3D relief model and evocation of the Scottish landscape, upon which one's own knowledge and experience of it can be related:

8th July 2015 - This incredible structure was nearly lost but, is now being restored. Having climbed many of Scotland's finest hills and being something of a map nerd, this is great.

15th March 2016 - It was so easy to spot the different islands, mountains and valleys.

21st January 2017 – It's hard to describe how fascinating it is to see a map of Scotland in 3D like this. Our first instinct was to start identifying all the islands and mountain ranges we knew.

27th October 2018 - Yes, to see it as a normal map viewpoint you need a drone but we found it just as fascinating walking round it and seeing Scotland from different angles and trying to recognise all the islands and other features.

As well as this appreciation of the Map as a topographic object, other reviewers point towards the Map's history and background as their main point of personal interest, with 74 reviews making reference to it:

9th February 2016 - This is a very interesting piece of history and particularly relevant to anyone of Polish descent or with an interest in WWII history.

15th March 2016 - A really interesting map. Full of history.

 2^{nd} October 2016 - To me the story and history of this was more interesting than the final result.

21st October 2017 - Great piece of Scottish history, I learnt how the Polish forces helped defend our coastline against a German invasion which led to the creation of the map.

4th August 2018 - This presentation of Scotland is fabulous and the attached history makes it a great sight to see for all, young and old.

20th August 2018 - Excellent historic story. Set in lovely grounds. Good information boards.

These repeated references to the Map's history, (which is told to the visitor via its three information panels) evidence its power as a historical object and 'memorial' to its creators, as well as the wider wartime folk-history of Poles in Scotland that the Map represents. Indeed, in a sense, the on-site provision of the Map's history transforms its grey, concrete landscape into an *emotional* one, as the spectral presence of the peopled past is conjured up by the telling of its story. As two reviewers note:

1st June 2017 - This is well worth seeing. I have passed the notice many times, and not ventured up. I am so glad we did. Lovely walk from that area. Great viewing deck - I highly recommend. It's not going to blow your socks off...but when considering its legacy...it is quite a moving experience.

November 2018 - Visited the Polish Map of Scotland at Barony Castle. What a wonderful piece of history. Maybe could do with a little colour, but when you think of the love and passion that has gone into the building of this, map and the information written, it becomes quite emotional.

Though the Map's TripAdvisor page offers a largely positive sense of visitor engagement as an object of topographic and/or historical interest, the response most often offered is one of mild disappointment that the Map doesn't exactly function cartographically. To elaborate, 45 reviewers mention the Map's viewing platform, with many expressing disappointment that it doesn't provide the necessary elevation to offer a God-like view of the complete country. This expectation is perhaps heightened by the fact that many of the most popularly circulated images of the Map available online are those taken from above by drone. As well as this lack of a suitable lookout from which to survey the entirety of the Map's landscape, other reviews question the decision to paint the Map in a uniform colour, as opposed to distinguishing particular features and landmarks. Such observations illustrate the highly ocular-centric nature of the Map itself (as a visual spectacle) as well as popular associations of cartography and landscape with survey and scene:

4th October 2016 – The Great Polish Map of Scotland is good but you get a much better view of it on the overhead pictures on the internet. Also the small viewing platform isn't high enough, you only really get a cross view.

5th November 2016 - It is, I'm sure, a great feat of planning and construction, and the various parts of the country are recognisable, but the big disappointment is that the viewing platform at the "southern" end of the map is not tall enough to enable a suitable top-down or even perspective view, and is too close to the map to allow a complete single image of it unless using a wide angle lens or panorama shot. Shame.

14th February 2018 - Really nice place..... very cleverly done.... it would be better if the viewing platform was higher (to give a view closer to what we see from all the drone photographs that are widely published).

22nd February 2018 - I had seen it on television and it looked tremendous. In reality, it was difficult to see the whole map, some areas were easy to make out, others more difficult.

14th May 2018 - I consider it an oddity in that the structure is totally white, as though Scotland is a big iceberg. There are no markings on it to show significant cities or a 'you are here' marker; however, it is interesting (in an odd sort of way)!

12th August 2018 - An extraordinary amount of effort apparently went into creating what looks like grey blobs of concrete. I thought that without the thorough explanation of the map around the display it would have been difficult to work out what it was. This is obviously ungracious on my part as it was meant as a deeply felt tribute to Scotland from the donor. However, time spent adding appropriate colour would, in my view, be a huge improvement.

29th August 2018 - No water at the time of visit and you don't really get the full benefit from the viewing platform. An aerial as the photo here is the only way to full appreciate this piece of artwork. A shame, I was looking forward to seeing it.

5th September 2018 - What a disappointment. Had the viewing platform been twice, or even three times, the height it might have gone further towards giving an aerial view. As it is, you're as well staying on the ground

October 2018 - Only takes 15-20 minutes to read all of the information and have a good look around, it was free so we can't complain but it would have been better if the viewing platform was slightly higher or if the landscape had been painted.

Though the viewing platform provides a scale-altitude perspective of 48,000 metres, it is apparent that many visitors are left disappointed by their inability to survey the entirety of the Map from above, as well as the lack of any painted annotation on the Map's topography to indicate specific landmarks and locations and to aid personal orientation. These impressions are indicative of the impulse and appetite to survey, orientate and understand spatial relationships whether in miniature or not. At ground level, the Map is not easy to read as a cartographic object due to its size, with its multiple waves of peaks seemingly indistinguishable from one another, and only small sections of its coastline apprehensible at any one time. Conditioned by mapping convention to apprehend the entirety of Scotland and its distinctive coastline from a top-down, North to South axis, the ability to walk 360 degrees around Scotland in this fashion is somewhat unsettling, as familiar landmarks and points of orientation are continually grasped for. A similar effect can be achieved on Google Earth by rotating one's perspective from the standard North-South orientation. It is understandable then, that visitors are drawn towards the Map's viewing tower at its southern aspect in a bid to better apprehend and understand the cartographic object laid out before them. Though for many visitors the Map's viewing tower doesn't provide the 'big reveal' that they desire, there is an overall appreciation throughout the TripAdvisor reviews of the Map as a work of "art" and "craftmanship", as well as a recognition and appreciation of the significant efforts of Mapa Scotland in restoring it:

24th September 2016 - The map itself is very hard to distinguish from ground level and even the small platform that has been built. Saying that the history of this site is fascinating and the skill it must have taken to create such art is to be commended. For the history and to see the craftsmanship alone it is worth a visit if you are nearby

The various impressions and experiences evidenced by TripAdvisor reviews illustrate the efficacy of the Map in appealing to individuals on different registers – as a map, model,

sculpture, and monument, merging history, landscape and heritage, on an individual and national scale. For some, the Map appears merely as "grey blobs of concrete" (12th August 2018), while to others it is a "marvellous work of art" (22nd April 2016). Exposed too, are differences in the geographical imagination of individuals, with frustration expressed by many at the lack of 'visual aids' for the observer, whereas for others, the task of trying to orientate oneself upon the Map's miniature landscape via personal knowledge and understanding is one happily embraced. In this sense, the Map perhaps resonates more with those better equipped with a geographical understanding, and appreciation for the Scottish landscape. Ultimately, the decision of Mapa Scotland to paint and present the Map in a fashion that highlighted its inherently sculptural qualities, as opposed to heavily annotating it as a relief map, is perhaps one that would sit more comfortably with its creators, who rather than seeking to create a cartographically accurate representation of Scotland, instead created an impressionistic piece of sculptural land art (see Figure 82). As a piece of art, its topographical inconsistencies become idiosyncrasies, and indeed, an emotive reminder that this concrete celebration of the Scottish landscape was formed not by geological processes, but by human hands, and within the brevity of human lives. As Keith Burns explains:

The fact that the map's finished is generating some controversy as well, and this came up at the AGM, because you meet lots of people who say are you going to paint it with colours, you know, and my strong view is, after swinging one way or the other, is that we shouldn't, that we should leave it – leave something to the imagination and treat it as a piece of sculpture. The rejoinder I've always put to people who want towns labelling on it and lighthouses and things is we don't want to make it into a fairground attraction, we want to make it into something like a practical Henry Moore piece of sculpture. 108



Figure 82: The sculptural qualities of the Map as seen from the viewing tower at its Southern aspect. From L to R: Malgorzata Luc, Keith Burns, Hayden Lorimer (*Image: author*)

The Future

Having restored, and in a sense reinvented, the Great Polish Map of Scotland to become an official component of Scotland's heritage fabric, how best to secure its future? Though the Map has now been stabilised and restored to a better condition than when it was 'finished' in the late 1970s, it is vital that custodianship and maintenance of the Map is ongoing, so as to avoid a return to entropy and ruin. Indeed, even after one winter season, the Map's protective coating of specialised paint suffered from significant spalling, with subsequent repair work completed in November 2018.

With their obligation fulfilled to restore the Map, discussion within the Mapa Scotland group turned towards how best to manage the transition from restoration, to routine care, maintenance and development. At the group's AGM in November 2017 Keith Burns expressed the view that the core volunteer group of Mapa Scotland were too geographically remote and small in number to form a sustainable core for the charity moving forward. Alongside this recognition that to continue to be viable, the Mapa Scotland group required local input, Burns signalled his intent to resign from the roles of project manager, secretary and trustee. A succession plan was set out identifying several key roles within the group to be filled, so as to allow Mapa Scotland to transition from the completion of their remit to restore the Map, to its ongoing management and maintenance. The roles identified were "Chair, Secretary, Treasurer, Membership Secretary, Local Site Maintenance Manager, Publicity and Events manager (including web), Fund Raising Manager, plus six active trustees selected from the above and/ or elsewhere". 109 It was also agreed that a steady income stream would have to be established to cover ongoing maintenance and contractor work when required. Importantly, it was also stated that, ideally, the identified roles should be taken up by individuals local to the Map, via organisations such as "community groups (e.g. Eddleston Community Council, University of the Third Age, historical and heritage groups, scouts, local schools and the local Polish diaspora". 110

Such an outcome illustrates the fact that throughout the Map's restoration, large-scale uptake and investment from the local community had been relatively limited, with a shortage of volunteer labour a persistent issue. Despite this, there is a clear understanding within the Mapa Scotland group that local ownership is key to ensuring the longer-term future of the Map. Though the statutory protection afforded to the Map as a listed building provides it

with a degree of legal protection and cultural recognition, the continuation of a community of interest, understanding and expertise around the Map to provide custodianship is vital. As Keith Burns considers:

It needs longer term [care], and there are early promising signs of this beginning to happen. It needs a sense of ownership by a group of local people, who form a critical mass to keep it looked after. And with Majka as the secretary now, and Jim and Tish Chalmers, living in the lodge at the bottom of the drive as general minders for routine stuff like clearing filters etc, I think we've got the makings of that core group. But it needs somebody to hold the core group together, and I think it'll begin to happen now. If the map starts disintegrating again because of neglect then my next job will be to do a full page feature for the local press on how the local community is abandoning a globally unique asset. And it's had enough media exposure now for it to develop into a kind of national scandal if it starts degrading again. 111

Despite the obvious potential for the Map's landowners, Barony Castle Hotel, to take over the routine maintenance and management of its landscape, it was felt that this was unrealistic due to their "lack of active interest over a lengthy period." - notwithstanding their £25,000 financial donation to Mapa Scotland in 2014. How to encourage genuine local ownership of the Map is thus the biggest challenge faced in securing its long-term future health and preserving the folk memory of Scots-Polish heritage it carries with it. Indeed, the manner in which the Map degraded and its story fragmented after its initial 'abandonment', illustrates how quickly both physical and social entropy can set in when places and objects are left uncared for. Ultimately then, though heritage is ostensibly about the past and 'fixed objects', it is very much a present-centred cultural practice and "fluid phenomenon" in which the future is a key concern (Avramie et al 2000: 6). Though the Map is now afforded a degree of status and protection due to its Category B listing in 2014, official heritage bodies such as Historic Environment Scotland are limited in their capacity to interject when a building or monument within their portfolio starts to suffer from neglect. For more 'marginal' monuments such as the Map then, it is important that their associated social values are recognised as a means of encouraging and nurturing an active community of interest who can fulfil the role of day-to-day observation, maintenance and care. As Keith Burns considered when questioned on the role of Historic Environment Scotland in preserving the map:

There's certainly some kind of ethical, professional responsibility not to let it happen, but whether they would have the capability and resources to actually wade in themselves, I'm not sure. If you look at the totality of their portfolio, they can't get involved at the detail level, preserving things. They seem to have a kind of advisory and support capability, but I think community ownership or alternatively, hotel ownership of the right kind. But it's got to be

ownership that's broader than the commercial interest in exploiting the map – there's got to be a greater ownership than that. And in the greater Eddlestone area, when you consider that it's a pretty affluent area for a start, lots of affluent retired people. It's got the Peebles Archaeological Society, the Tweeddale Archaeological Society, the Biggar Archaeological Society, the University of the Third Age, scout groups, high schools that are teaching craft and design – perfect project work for schools. Businesses for team bonding – the sort of thing we ran with the army and Torness [power station] - we had a great team of graduate apprentices from Torness one day who rebuilt Mull and Skye foundations in a day. It needs that kind of sense of community ownership to preserve it. 113

Conclusion

What this chapter sought to do is document the genesis and construction of a remarkable cartographic object and its subsequent ruin, rediscovery and reinvention to become an enshrined heritage object and monument.

As stated in the introduction, the Map's present meaning and cultural resonance is drawn from the story that has been told around it. The chapter has been structured to tell the "small story" (Lorimer 2003) of the Map from its inception and construction through to its ruin, rediscovery and restoration. Ultimately, the past is a story that we tell ourselves (on a personal and communal level) via a selective act of remembering (as well as forgetting), and we use places and objects as a means of solidifying and making tangible the otherwise nebulous past. As Avramie et al state, "Social groups are embedded in certain places and times, and as a matter of routine, use things (including material heritage) to interpret their past and their future. In this sense, conservation is not merely an arresting process but a means of creating and recreating heritage" (2000: 11). What is compelling in the Map's case is the manner in which a largely forgotten 'ruin' was reimagined and restored as a heritage object by a ground-up community of interest to become in Keith Burns' words, "a historical catalyst for reminding the new generation of Poles and Scots, why there are so many Poles in Scotland". 114 In this sense, the Map's restoration was seen as a means of re-remembering the historical contribution of Poles to Scotland's cultural life and legitimising the presence of more recent Polish immigrants to the country. As Harrison states, heritage conservation is "a selective process by which places which represent the nation are collected and displayed for education and integration of citizens into a particular notion of society and national identity" (Harrison 2008: 180).

Much of the potency of the Map as a cultural and historical symbol is in its evocation of the Scottish landscape, which represents the nation in miniature. Indeed, it was a love of landscape that motivated Keith Burns and the Mapa Scotland team to restore the Map in the first instance, prior to their knowledge of the Map's 'Polish provenance'. As Macleod states "questions of landscape, culture and identity are closely intertwined with the official institutional expression of nations and states" (2002: 54) and as such, the Map was positively embraced by the Scottish Parliament. The fact that the Map also tells the story of Poles in Scotland adds to its utility as a cultural and political object in the promotion of Scotland as a welcoming, cosmopolitan and forward-looking European nation. Notably, the Map resonates strongly on an individual level too, due to the fact that the Scottish landscape plays such a key role in harbouring feelings of identity and attachment.

The manner in which the Map was physically and culturally reconstituted from a largely forgotten ruin to become an enshrined heritage object and monument can be considered as a process of "heritagisation" (Klekot 2012). That is, the process by which the value of particular material objects-as-heritage are acknowledged. The process of heritagisation is a cultural and political one subject to embedded power relations, as well as one based on the physical reconstitution or conservation of an object or place. In this sense then, we can consider the 'Great Polish Map of Scotland' as a successful and instructive example of heritagisation from the 'ground-up', in which the intentional, embodied, proximate and hands-on heritage landscaping of its concrete fabric was key.

As Klekot notes (2012: 460), "To undergo conservation or restoration, an ancient vestige has to be acknowledged as 'historically, or artistically valuable'; that is, it must get heritagised". Though the Map is not an "ancient vestige" *per se*, the principle by which it was acknowledged as historically and artistically valuable remains the same. The heritagisation of the Map to become a valued historic monument was helped by the fact that it is a tangible object, with clear artistic merit. Indeed, its artistic value as a form of 'land art' is what activated its community of interest in the first instance. In this sense, its physical reconstitution was seen as a logical and valuable pursuit. As well as its perceived inherent artistic value, the reassembling of the Map's Polish folk-history by Mapa Scotland also provided an important source of historical value and interest. With regards to the 'work' of heritage then, Mapa Scotland were highly adept at translating the Map's artistic and historical value into contemporary cultural value by their resourceful and skilled

campaigning to gain official acceptance of the Map as a historical object by those with the power to do so – namely Historic Environment Scotland. The wider embrace of the Map by both the Scottish and Polish governments due to the campaigning of Mapa Scotland has lent further cultural credence to its reinvention as an official component of national heritage(s).

Though the Map has become an officially advocated heritage monument, the ground-up basis of its recovery and restoration by a small group of landscape enthusiasts illustrates the importance of unofficial communities of interest in activating the latent heritage (or social) values of places or objects (Jones 2016). Due to the significant input of time, energy and resources by this small community of interest, the awareness and appreciation of the Map is now far more widespread – evidenced by its frequency of visitors and associated TripAdvisor page as well as its 'community' Facebook page. However, as Klekot notes "the construction of a monument is a continuous process carried out via: (1) its access policy, which comprises visiting practices and other activities hosted by the place; (2) the uses of its visual (and other) representations; and (3) its maintenance" (2012: 460). Despite the completion of the Map's restoration then, its ongoing function as a historic monument is one that requires perpetual maintenance, not only of its physical fabric but also of its 'cultural' fabric by future communities of interest.

Like all things in and of the world then, the future of the Great Polish Map of Scotland is uncertain. Such an outcome illustrates the ongoing, ultimately processual nature of heritage, and the manner in which historical value is culturally ascribed (or maintained) in the present as opposed to an inherent, 'fixed' quality of objects and places inherited from the past. As Smith provocatively states, "There is, really, no such thing as heritage", but rather, heritage discourse surrounding places and things 'of the past' that shape our contemporary relationships to them (2006: 11).

6. The Rock and The Map: Conclusion

In this thesis I have addressed three self-set research questions through situated investigations into two contrasting but complementary instances of heritage landscaping in Scotland. In the thesis conclusion I want to review both instances of heritage landscaping in relation to those original research questions, as well as drawing some broader conclusions concerning the 'nature' of landscape and heritage, and how my own research contributes to critical conversations about these concepts.

Based upon a phenomenologically-oriented participatory methodology (through which I embedded myself in each emergent landscape) supported by a combination of archival research, discourse analysis and semi-structured interviews, I have presented a historical-cultural geography of each study site, to provide context to my situated, ethnographic observations and responses to each as social situation, material process, temporal event and lived reality. While it is necessary that I draw my research to a concluding point, the 'lives' of the Rock and the Map are of course, processual, ongoing, and as such, I make no claims to an authoritative "last word" (Pearson 2006: 16), but instead offer some reflections based on my sustained, and ultimately subjective encounters with each place.

While I utilised a participatory methodology as a means of 'extracting' knowledge from each place, it also provided an important form of contribution beyond the academy. In attending several working parties at the Map, I was able to contribute valuable volunteer labour towards its restoration while gaining direct embodied experience of the effort this required. Though the 'work' of heritage landscaping at the Rock was less obviously defined, in compiling an in-depth cultural biography of climbing culture at the Rock and advocating for the inclusion of its associated heritage in Historic Environment Scotland's Official Statement of Cultural Significance (via the ACCORD project), I was able to contribute to the longer-term recognition and awareness of its unique sporting heritage. As well as the benefits of proximity then, a participative approach to landscape research also enables the researcher to contribute to the 'work' of place-based communities of interest such as The Rock and The Map, adding value to our academic endeavours. In what follows, I revisit each research question in turn, and take stock of the responses arising from my work.

1. By challenging traditional idealisations of the Scottish landscape what cultural opportunities does the New Scottish Landscape present?

As a Google image search of the term 'Scottish landscape' quickly reveals, in popular discourse, discussion and debate surrounding the Scottish landscape, it is the landscapes of the Scottish Highlands that are overwhelmingly represented. Though the majority of Scotland's population live outwith the Highlands, the region's ostensible authenticity and 'wildness' generate individual and collective feelings of attachment and national belonging, often expressed through immersion and embodied engagement in its landscape albeit on an 'excursionist' basis. While the 'grand narrative' of the Scottish Highlands is central to Scotland's image of itself, it is also important to tell "small stories" (Lorimer 2003) concerning the more hybrid, proximate and everyday landscapes that surround us, which also have the power to generate intensities of belonging and attachment, as well as distinctive heritage values. Indeed, with the 'democratic' shift of both landscape and heritage policy away from the exclusivity of special designation, the concept of a New Scottish Landscape is pertinent: one recognising and celebrating complexity, messiness, alterity, hybridity and ordinariness as well as processes of ruin, renewal and reinvention.

In the many small stories that compose the varied patchwork of the New Scottish Landscape we can also certainly raise up the Great Polish Map of Scotland and Dumbarton Rock as two compelling instances of the potency of place in generating dedicated communities of interest. To adequately account for the situated nuances of small but significant landscapes such as the Rock and the Map and shift the democratic rhetoric of an "all-landscapes" policy environment into meaningful action (Dalglish 2018), a detailed, holistic, experimental and site-specific approach such as my own can be utilised, adding depth to the broader brush-strokes of large-scale forms of landscape survey such as Landscape Character Assessment. As Jones notes (2016), novel and intimate forms of landscape encounter can also be utilised in the heritage arena as a means of better accounting for the largely intangible social values that the historic environment generates outwith, or in opposition to, official discourse.

In challenging traditional idealisations of the Scottish landscape as one essentially rooted in the Highlands then, the New Scottish Landscape offers a productive cultural alternative that is attentive to the importance of everyday, local landscapes in generating intensities of attachment and belonging. While many of the places drawn under the banner of the New Scottish Landscape may be considered conventionally as marginal, degraded, or derelict - as

the Rock and the Map show, absence equals opportunity, allowing alternative meanings and productive place associations to be generated by dedicated communities of interest.

2. How do dedicated communities of interest set about making meaning from their surrounding historic environments?

At the Rock and the Map, situated practices of landscape are integral to the process of heritage making at each place. In deploying the term heritage landscaping throughout this thesis, I have sought to capture this dynamic, present-centred nature of heritage as a form of ongoing situated practice (in which the past is ever present) that I detect as absent from Garden's "heritagescape". While intended to convey the "unique experiential qualities and space of heritage sites" (2009: 288), Garden's term still suggested a 'scape' - something bounded or final as opposed to a continued happening. I also intend for heritage landscaping to act as shorthand for Harvey's notion of heritage and landscape as deeply entangled phenomena, which are most productively approached together, as opposed to in the isolation of separate conceptual fields (2015). The increasing emphasis on the intangible social values of heritage places, by which "practice and experience provide the locus for the creation of meaning in relation to the historic environment" (Jones and Leech 2015: 34), lends further credence to the notion of heritage landscaping as a useful term of engagement, which is attentive to the embodied, experiential and ongoing nature of heritage as a cultural practice, entangled within situated practices of landscape.

Though contrasting in nature, both the Rock and the Map illustrate the centrality of situated practices of landscape in the 'creation' of heritage and the validity of a processual, 'performative' approach to the research and exposition of landscape and heritage more broadly. To elaborate, without the ground-level restoration and situated 'landscaping' of the Map, it would have remained a largely forgotten albeit compelling local curiosity. Indeed, it was only through intervention and the restoration of the Map's physical fabric that its reinvention by Mapa Scotland as a valuable historical object and cultural symbol could be 'backed up'. As such, participating in the concrete landscaping by which the Map was restored (and given renewed meaning) allowed me to get to the heart of the heritage-making process.

In a similar vein, it is the ongoing performance and practice of rock climbing that provides the basis of Dumbarton Rock's climbing heritage, which in effect, 'conserves' its value for the future. Though the basalt 'heritage fabric' upon which the Rock's climbing community operates has claims to a permanence and resilience far exceeding the future-proofed plans of any heritage conservator, it is only through the fleeting performance of the Rock's 'historical' climbing routes that its invisible archaeology is illuminated and made legible – an act of temporary inscription that I sought to capture through my own creative intervention in the Rock's landscape with light, movement and photographic abstraction. While the objects and places 'of the past' from which we draw and endow meaning upon are integral to the 'doing' of heritage then, it is the process and practice of heritage 'itself' that bestows them with value and meaning. It is apparent then that the import of a landscape sensibility has contributed to the broadening of heritage practice to account for, and help elucidate, the embodied, experiential aspects of the heritage making process - as recognised in the concept of social value (Jones and Leech 2015). At the same time, the import of a heritage sensibility to the study of landscape, offers an important means of adding temporal depth to its research and exposition, avoiding the tendency for phenomenologically derived methodologies to sway towards presentism (Harvey 2015). This was an outcome I sought to pursue by providing historical context and temporal depth to my embodied engagements with the Rock and the Map via the provision of a historical-cultural geography of each place.

3. What do the Rock and the Map illustrate with regards to the 'nature' of landscape and heritage?

Having considered the Rock and the Map separately in the thesis' central empirical chapters, when considered together, their differing 'outcomes' illuminate the broad spectrum across which heritage and landscape operate. As the figure below illustrates, the Rock and the Map can be configured as opposite (but not extreme) points on a broad spectrum of landscape and heritage from the tangible to intangible, with their positioning within this spectrum inflecting upon the ways in which each has unfolded:

The Rock<<<<<>>>>>The Map

Incidental Intentional
Intangible Tangible
Unauthorised Authorised
Non-curated Curated

Tactile Visual

Performed Representational

To elaborate, we can consider the climbing heritage of Dumbarton Rock as a largely incidental one. That is, one that has accumulated organically as an outcome of decades of aggregated practice by its associated climbing community. Due to its basis within the ongoing practice and performance of the Rock's climbing routes, it is a predominantly intangible heritage that holds more in common with indigenous forms of heritage (oral, storied) than it does with the conventional object-led mode of Western heritage practice that characterises the castle that sits atop the outcrop (Hale et al 2017). The incidental nature of the Rock's climbing heritage is illustrated by the fact that it lay somewhat dormant until the external threat of "graffiti-gate", requiring the climbing community to stake their claim as legitimate stakeholders in the Rock's ongoing management and future, with heritage providing the 'evidence' of decades of inhabitation and use of the Rock's north-west area. How to value and represent the Rock's largely intangible climbing heritage (or social value) alongside its more conventional discourse as a military fortification was an issue that the ACCORD project sought to address through the application of digital technologies to 'coproduce' heritage objects with the climbing community. Although the efficacy of these digital objects as material heritage has been somewhat limited (Fisher 2015), the ACCORD project was ultimately successful in advocating for the Rock's climbing heritage to be written into its Official Statement of Cultural Significance, held by Historic Environment Scotland.

In effect then, the Rock's climbing heritage was formally recognised as a component of its significance and wider social value as a historic monument – indicative of an increasing emphasis in heritage practice upon recognising the informal (and largely intangible) social values that historic monuments generate outwith their official discourse (Jones 2016). However, despite HES's recognition of the Rock's climbing heritage in writing, little change has occurred 'on the ground', with the focus of HES remaining on the management of the

heritage fabric of the castle above. While this 'benign indifference' of HES towards the Rock's social value as a climbing landscape illustrates the continued prevalence of architectural and historical values in routine heritage conservation and management (Jones 2016), it is an outcome that is - perhaps counterintuitively - favourable for the Rock's climbing community. To elaborate, it is marginality that has allowed rock climbing at Dumbarton Rock to flourish, with the spatial separation of the Rock's north-west area from the castle itself providing the 'latent space' for its climbing culture to take root in over the decades. This simply would not have been possible had the climbing area conflicted with the spatial parameters of the Rock's management as a historic monument. In continuing to allow the climbing community to operate without intervention, while 'protected' from surrounding developments within the boundaries of an Ancient Scheduled Monument, in 'doing nothing', HES maintain the conditions necessary for the perpetuation of the Rock's climbing heritage through the continued practice and performance of its climbing routes.

In contrast to the Rock, the Map can be considered as a more intentional form of heritage landscaping whereby a clearly tangible 'ruin' was reclaimed and reconstituted as a valuable historical object in an act of material and cultural salvage. As a 'bounded' object with aesthetic visual appeal, the process of 'activating' the Map's latent heritage properties was a more clearly defined task, with an obvious end point in the completion of its physical restoration. In this sense, the 'work' required to mobilise the Map's heritage value was more defined and graspable than the "invisible archaeology" (Hale *et al* 2017) that forms the basis of the Rock's ongoing climbing heritage.

As I describe in Part II of Chapter 5, the Map's representational, symbolic landscape qualities and its cultural utility (as an appealing version of a reflexive, diverse, cosmopolitan Scotland) eased its acceptance as an official component of Scotland's national heritage, evidenced by its Category-B listed status and literal signposting as a place of historical interest, via the ubiquitous brown road sign so familiar to the nation's touring motorists. Though the communities of interest and social values that define the Rock and the Map both emerged unofficially from the 'ground-up', the commensurate nature of the Map with conventional object-led heritage practice and popular national symbolism enabled its "heritagisation" (Klekot 2012) from a neglected local curiosity to become an officially recognised historical monument and cultural symbol for the celebration of a twenty-first century 'European' Scotland. To summarise, we can consider the Map as an example of

intentional heritage via landscape intervention and salvage, and by contrast, the Rock as a form of *incidental* heritage, enabled by long-term *non-intervention* in its climbing landscape from official bodies.

With regards to the effective promulgation of the social values that heritage places generate alongside their official discourse then, there is no one-size-fits-all solution, with a 'hands-off' approach more appropriate than intervention in situations such as Dumbarton Rock. Like the tendency for unmanaged, 'edgeland' landscapes to become havens for biodiversity, perhaps where possible, some fallow ground should be left vacant in and around heritage places to allow for alternative meanings and social values to take root and flourish outwith their official discourse.

Loosening the degree of control that heritage bodies seek to wield over the places and objects of their care is one that resonates with DeSilvey's (2017) notion of "curated decay"; an alternative to the dominant preservationist ethic of heritage practice, whereby decay and entropy are reconfigured as generative (as opposed to purely destructive) processes that express the ecological context within which heritage objects and places are entangled. By letting go in this way, ostensible boundaries between the natural and cultural are transgressed, creating new and unpredictable forms of association, meaning and memory. The Map's period in ruin provides an example of the generative potential of decay, whereby the breakdown of its fabric revealed traces of its makers, and its colonisation by plants and weeds lent it un an uncanny sense of the natural. Though DeSilvey's approach may be radical in the context of traditional heritage conservation, by "devolving central and local government from [the] costly responsibilities of protecting heritage places" (Hale 2015: 2) the contemporary democratisation of heritage practice is suggestive of a turn towards just such a loosening of the professional, preservationist ethic which has traditionally defined it, with more space given to alternative modes of interpretation. Indeed, as heritage agencies contend with the challenges of shrinking budgets and the increasing threat of the environmental impacts of climate change to historical objects and places, it appears likely that loss, decay, entropy and change will have to be increasingly figured into the ongoing narrative of the historic environment (Bartolini & DeSilvey 2019).

Heritage Futures

While heritage is popularly perceived as a concern with objects inherited from the past, as a process, it is in fact, a present-based and "future-making" practice (Harrison et al 2016). Indeed, the site-specific, situated nuances of the Rock and the Map illustrate the manner in which "heritage is neither fixed nor inherent, but emerges in dialogue among individuals, communities, practices, places, and things" (Harrison 2015: 35). To conduct effective heritage research then, it is necessary to go beyond the objects of heritage themselves to consider the complex web of meanings between people, places and things by which heritage is "assembled in the present" (Harrison 2015: 35) — a holistic perspective which a "landscape sensibility" and geography more broadly, can provide (Harvey 2015). In approaching my two place-based inquiries as instances of heritage landscaping, I sought to invoke just such a landscape sensibility, which was attentive to the various ways in which the heritage of each place emerged through "dialogue" and practice, as opposed to something inherent to their fabric (Harrison 2015).

Re-casting heritage as a discursive, present-based practice with profound implications for the future poses urgent questions regarding 'who' has the power to decide what should be conserved for future generations and the need for individuals and communities to lay claim to their own heritage sensibilities. Indeed, despite the current recognition of the heritage values associated with the Rock and the Map respectively, the fluid nature of heritage (and a perpetual changing of the guard) means that these values will require continual renewal and advocacy in the future. The difficulties faced by Mapa Scotland in handing-on responsibility for the Map to sustainable, local 'ownership' since its completion, serve to remind of the greater need for unofficial 'communities of interest' to maintain the vitality of heritage places that lie outwith the direct care of state-sponsored heritage organisations.

Though offered a degree of sanctuary by the designated status of an Ancient Scheduled Monument, the value of the Rock's climbing heritage will require continual renewal and advocacy, particularly in the context of development pressure at its margins, with new housing schemes creeping closer to the 'historic environment' of the Rock. With the spectre of potential loss ever present in the heritage arena (DeSilvey and Harrison 2019), what to include and what to exclude in the continuing narrative of places such as the Rock and the Map, will be a question posed to successive generations. Like a footprint left in wet sand

"social groups are embedded in certain places and times" (Avramie et al 2000) for only a short while, and due to this transience, we will always use processes of landscape and heritage to tether ourselves to a meaningful past, a situated present, and a future trajectory.

Appendices

Appendix 1: Climbing grade table

UK grades comparison table Routes Bouldering

UK adj.	UK tech.	French sport	US	Aust.	UIAA	German
М		FI/2	5.2	10	I	- 1
D		FI	5.3	II	II	II
VD	3c	F2	5.4	12	Ш	III
S	4a	F3	5.5	13	IV	IV
HS	4b	F4	5.6	14	IV+	٧
VS	4c	F4+	5.7	15	٧-	VI
	5a	F5	5.8	16	۷ ۷+	N.
HVS	Ja	F5+	5.9	17	VI-	VIIa
EI	5b	F6a	5.10	18	VI	VIII
EI		F6a+	5.10+	19	VI+	VIIc
E2	5c	F6b	5.10++	20	VII-	VIIIa
	30	F6b+	5.lla	21	VII	VIIIb
E3		F6c	5.IIb	22	VII+	VIIIc
122	6a	F6c+	5.llc	2222	VIII-	IXa
E4		F7a	5.lld	23	VIII	IXb
		F7a+	5.12a	24	VIII+	IXc
E5	6b	F7b	5.12b	25	IX-	
11000000	OD	F7b+	5.12c	26	IV-	Xa
E6		F7c	5.12d	27	IX	Xb
		F7c+	5.13a	28	IX+	Хc
E7	6c	F8a	5.I3b	29	X-	Xla
		F8a+	5.13c	30	v	ХІР
E8		F8b	5.I3d	31	Х	AID
		F8b+	5.14a	32	X+	XIc
E9		F8c	5.l4b	33	XI-	XIIa
	7a	F8c+	5.14c	34	VI-	
EIO	3,00	F9a	5.14d	35	XI	ХІІЬ
EII	7b	F9a+	5.15a	35	ΧI	ХІІЬ
	7c	F9b	5.I5b		Mercen I	
EI2		F9b+	5.15c	35	XI	XIIb

V grade	UK technical grade	Font grade
V0-	4c	3
V0	5a	4
V 0+	5b	4+
VI	5c	5 5+
V 2		6A
V 3	6a	6A+ 6B
V4		6B+
V 5	6b	6C
V6		6C+ 7A
V 7	6c	7A+
V8	30.00	7B 7B+
V9		7C
VIO	7a	7C+
VII		8A
VI2	7b	8A+
VI3	220	8B
VI4	7c	8B+
VI5		8C
VI6	8a	8C+

UK climbing grades comparison table (Image: British Mountaineering Council)

At the Rock, traditional routes are graded using a combination of the UK adjectival and technical grade. For instance, the route *Longbow* is graded E1 5b to communicate both its 'overall difficulty' (E1) and technical difficulty (5b). Prior to the introduction of E-grades in the late 1970s, Very Severe or VS was the 'highest' grade awarded to climbs. As such, many of the Rock's 1960s routes (such as *Longbow*) were subsequently regraded to reflect their true difficulty. With regards to the Rock's bouldering problems, the UK technical grade was traditionally used to indicate difficulty but since the early 1990s onwards, the Font grading system has been adopted. The Rock's sport routes are graded using the French sport system.

List of References

Alcock, L. (1975) A multi-disciplinary chronology for Alt Clut, Castle Rock, Dumbarton, *Society of Antiquaries of Scotland, Proceedings*. Vol. 107 103-113.

Antrop, M. (2013) A brief history of landscape research. In Howard, P. Thompson, I. Waterton, E. (eds) (2013) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Avramie, E. Mason, R. and De La Torre, M. (2000) *Values and Heritage Conservation Research Report*. The Getty Institute Trust, Los Angeles, CA.

Bartolini, N. DeSilvey, C. (2019) Recording Loss: film as method and the spirit of Orford Ness, *International Journal of Heritage Studies*. DOI: 10.1080/13527258.2019.1570311.

Beaumont, P. (1991) Power-drill climbers accused of vandalism: Mountaineering's image on slide after row over bolts in historic castle cliff. 31st March, *The Observer*.

Bender, B. (2002) Time and Landscape. Current Anthropology, 43(4) 103-112.

Bennet, D. (1972) *The Southern Highlands: Scottish Mountaineering Club District Guide*. Edinburgh: The Scottish Mountaineering Trust.

Brown, S. (2010) *The Stone Country Guide to Dumbarton Rock*. Glasgow: Stone Country Press.

Butler, A. Berglund, U. (2014) Landscape Character Assessment as an Approach to Understanding Public Interests within the European Landscape Convention. *Landscape Research*, 39(3) 219-236.

Butler, A. (2016) Dynamics of integrating landscape values in landscape character assessment: the hidden dominance of the objective outsider. *Landscape Research*, 41(2) 239-252.

Carswell, A. (2011) 'Bonnie Fechters': The Polish Army and the Defence of Scotland 1940 – 1942. In Devine, T. & Hesse, D. (eds.) *Scotland and Poland: Historical Encounters*, 1500-2010. Edinburgh: Birlinn.

Cílek, V. (2015) To Breathe with Birds. Philadelphia: University of Pennsylvania Press.

Cosgrove D. Daniels, S (1988) *The iconography of landscape: essays on the symbolic representation, design and use of past environments*. Cambridge: Cambridge University Press.

Council of Europe (2000) 'European Landscape Convention'. *Council of Europe* [online] Available at: https://www.coe.int/en/web/conventions/full-list/-/conventions/treaty/176 [Last accessed 29th October 2019].

Cresswell, T. (1996) *In Place/Out of Place*. Minneapolis: University of Minnesota Press.

Cresswell, T. (2012) Review essay, Nonrepresentational theory and me: notes of an interested sceptic. *Environment and Planning D: Society and Space*, (30) 96-105.

Crocket, K. (1975) Western Outcrops. Glasgow: Nevisport.

Crocket, K. Richardson, S. (2009) *Ben Nevis: Britain's Highest Mountain*. Edinburgh: Scottish Mountaineering Trust.

Crouch, D. (2003) Performances and constitutions of nature: a consideration of the performance of lay geographies. In Szerszynski, B., Heim, W. and Waterton, C. (eds) *Nature performed: environment, culture and performance*. Oxford: Blackwell, 17-30.

Crouch, D. (2010) Flirting with space: thinking landscape relationally. *Cultural Geographies*, 17(1) 5-18.

Crouch, D. (2013) Landscape, performance and performativity. In Howard, P. Thompson, I. Waterton, E. (eds) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Crouch, D. (2015) Affect, Heritage, Feeling. In Waterton E, Watson. S. (eds.) (2015) *The Palgrave Handbook of Contemporary Heritage Research*. New York: Palgrave Macmillan.

Dalglish, C. (2012) Archaeology and Landscape Ethics. World Archaeology, 44(3) 327-341.

Dalglish, C. Leslie, A. (2016) A question of what matters: landscape characterisation as a process of situated, problem-orientated public discourse. *Landscape Research*, 41(2) 212-226.

Dalglish, C. (2018) Community Empowerment and Landscape: Research Report, Community Land Scotland.

Daniels, S. Pearson, M. & Roms, H. (2010) Editorial. *Performance Research*, 15(4) 1-5.

Daniels, S. (2012) The place of landscape: Conversing with cultural geography. In Bell, S. Sarlov Herlin, I. Stiles, R. (eds) (2012) *Exploring the Boundaries of Landscape Architecture*. Oxford: Routledge.

Della Dora, V. Daniels, S. Lorimer. H. (2011) Classics in human geography revisited: Denis Cosgrove and Stephen Daniels (eds) (1988) The Iconography of Landscape: Essays on the Symbolic Representation, Design and Use of Past Environments. Cambridge: Cambridge University Press. *Progress in Human Geography*, 35(2) 264-270.

DeSilvey, C (2006) Observed Decay: Telling Stories with Mutable Things. *Journal of Material Culture*, 11(3) 318-338.

DeSilvey, C. (2012) Making Sense of Transience: An Anticipatory History. *Cultural Geographies* 19(1) 31-54.

DeSilvey, C. and Edensor, T. (2012) Reckoning with Ruins. *Progress in Human Geography*, 37(4) 465-485.

DeSilvey, C. Harrison, R. (2019) Anticipating loss: rethinking endangerment in heritage futures. *International Journal of Heritage Studies*, 26(1) 1-7.

Dewsbury, J-D. (2000) Performativity and the event: enacting a philosophy of difference. *Environment and Planning D: Society and Space*, (18) 473–496.

Dewsbury, J-D. Wylie, J. Harrison, P. Rose, M. (2002) Enacting geographies. *Geoforum* (32) 437-441.

Dietkow, A. (2011) Poles in Scotland – Before and After 2004. Devine, T. & Hesse, D. (eds.) *Scotland and Poland: Historical Encounters*, *1500-2010*. Edinburgh: Birlinn.

Donnelly, B. (2013) Polish war hero who helped guard Scotland tells his story. 3rd August, *The Herald* [online] Available at:

 $https://www.heraldscotland.com/news/13116621.Polish_war_hero_who_helped_guard_Scotland_tells_his_story/~[Last~accessed~29^{th}~October~2019].$

Duncan, N. Duncan, J. (2010) Doing Landscape Interpretation. D. DeLyser, S. Herbert, S. Aitkin, M. Crang, and L. McDowell, (eds) 2010. *The SAGE Handbook of Qualitative Geography*. London: SAGE Publications Ltd.

Edensor, T. (2000) Walking in the British Countryside: Reflexivity, Embodied Practices and Ways to Escape. *Body & Society*, 6 (3-4) 81-106.

Edensor, T. (2005) The ghosts of industrial ruins: ordering and disordering memory in excessive space. *Environment and Planning D: Society and Space*, 23(6) 829-849.

Edensor, T. and Lorimer, H. (2015) "Landscapism" at the Speed of Light: Darkness and Illumination in Motion. *Geografiska Annaler: Series B, Human Geography* 97(1) 1–16.

Everett, R. (ed.) (1994) Lowland Outcrops, Edinburgh: Scottish Mountaineering Trust.

Fairclough, G. (2008) New Heritage, an Introductory Essay – People, Landscape and Change. In Harrison, R. Fairclough, G. Jameson Jnr, J. Schofield, S. (eds) (2008) *The Heritage Reader*. New York: Routledge.

Fairclough, G. (2012) A prospect of time: Interactions between landscape architecture and archaeology. In Bell, S. Sarlov Herlin, I. Stiles, R. (eds) (2012) *Exploring the Boundaries of Landscape Architecture*. Oxford: Routledge.

Farley, P. and Symmons Roberts, M. (2011) *Edgelands: Journey's into England's True Wilderness*. Jonathan Cape: London.

Fisher, A. (2015) 'Digitally Capturing Associative Cultural Landscapes: The Climbers' Dumbarton Rock. MSc Thesis, Glasgow School of Art. Unpublished.

Fleming, A. (2006) Post-processual Landscape Archaeology: a Critique. *Cambridge Archaeological Journal*, (16) 267-280.

Forster, A. Vetesse-Forster, S. Borland, J. (2012) Evaluating the cultural significance of historic graffiti. *Structural Survey*, 30 (1) 43-64.

Gallagher, M. (2014) Sounding ruins: reflections on the production of an 'audio drift'. *Cultural Geographies*, published online July 21, 2014, 1-19.

Gandy, M. (2013) Marginalia: Aesthetics, Ecology, and Urban Wastelands. Annals of the Association of American Geographers, 103(6) 1301-1316.

Garden, M. E. (2009) The Heritagescape: Looking at heritage sites. Louise et al. (eds) (2009) *Heritage Studies: Methods and Approaches*. New York: Routledge.

Gilchrist, P. (2012) Beyond the Brink: Beachy Head as a Climbing Landscape. *The International Journal of the History of Sport*, 29(10) 1383-1404.

Hale, A. (2015) Connecting with the Clyde: Anticipating the River Clyde as an Educator. Conference Presentation [online] Available at: https://historicenvironment.academia.edu/AlexHale [Last accessed 29th October 2019].

Hale, A. Fisher, A. Hutchinson, J. Jeffrey, S. Jones, S. Maxwell. M. & Watson, J.S. (2017) Disrupting the heritage of place: practising counter-archaeologies at Dumby, Scotland. *World Archaeology*, 49(3) 372-387.

Hall, S. (2008) Whose heritage? Un–settling 'the heritage', re-imagining the post-nation. G. Fairclough et al, (eds.) *The Heritage Reader*. London: Routledge, 219–228.

Hansom, J. (2012) Geodiversity in a changing environment. *Scottish Geographical Journal*, 128(3-4) 173-176.

Harley, J. Brian. (1996) Maps, Knowledge, and Power. *Exploring Human Geography: A Reader*. London: Arnold.

Harris, J. (2011) Guerilla art, social value and absent heritage fabric. *International Journal of Heritage Studies*, 17(3) 214-229.

Harrison, R. (2008) The politics of the past: conflict in the use of heritage in the modern world. In G. Fairclough et al, (eds.) *The Heritage Reader*. London: Routledge, 177–190.

Harrison, R. (2012) *Heritage: critical approaches*, London: Routledge.

Harrison, R. (2015) Beyond "Natural" and "Cultural" Heritage: Toward an Ontological Politics of Heritage in the Age of Anthropocene. *Heritage & Society*, 8(1) 24-42.

Harrison, R. Bartolini, N. DeSilvey, C. Holtorf, C. Lyons, A. Macdonald, S. May, S. Morgan, J. Penrose, S. (2016) Heritage Futures. *Archaeology International*, (19) 68–72.

Harrison, R. Fairclough, G. Jameson Jnr, J. Schofield, S. (2008) Introduction: Heritage, Memory and Modernity. In G Fairclough et al, (eds.) *The Heritage Reader* London: Routledge.

Harvey, D. (2001) Heritage Pasts and Heritage Presents: temporality, meaning and the scope of heritage studies. *International Journal of Heritage Studies*, 7(4) 319-338.

Harvey, D. (2013) Emerging Landscapes of Heritage. Howard, P. Thompson, I. Waterton, E. (eds) (2013) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Harvey, D. Waterton, E. (2015) Editorial: Landscapes of Heritage and Heritage Landscapes. *Landscape Research*, 40(8) 905-910.

Harvey, D. (2015) Landscape and heritage: trajectories and consequences. *Landscape Research*, 40(8) 911-924.

Herrington, S. (2006) Framed Again: The Picturesque Aesthetics of Contemporary Landscapes. *Landscape Journal*, 25(1) 22-37.

Heywood, I. (1994) Urgent dreams: climbing, rationalization and ambivalence. *Leisure Studies*, (13) 179–194.

Hill, L. (2013) Archaeologies and geographies of the post-industrial past: landscape, memory and the spectral. *Cultural Geographies*, 20(3) 379-396.

Howett, K. (2004) Cliffs. Harrison, S. et al *Patterned Ground: Entanglements of Nature and* Culture. 62-64, London: Reaktion.

Ingold, T. (2000) The Perception of the Environment: Essays on livelihood, dwelling and skill. London: Routledge.

Ingold, T. (2010) Footprints through the weather-world: walking, breathing, knowing. *The Journal of the Royal Anthropological Institute*, (16) 121-139.

Jack, I. (2013) How did vast heaps of industrial waste become the pride of a community? 7th September, *The Guardian* [online] Available at: https://www.theguardian.com/commentisfree/2013/sep/07/industrial-waste-pridecommunity [Last accessed 29th October 2019].

Jaramillo, G. (2016) Miners' lamp: memory and the underground through a light installation on Bonsall Moor. *Cultural Geographies*, 23(4) 727-733.

Jeffrey, S. (2015) Challenging Heritage Visualisation: Beauty, Aura and Democratisation. *Open Archaeology*, (1) 144-152.

Jones, O. (2011) Geography, Memory and Non-Representational Geographies. *Geography Compass*, 5(12) 875-885.

Jones, S. Leech, S. (2015) *Cultural Value: Valuing the Historic Environment*, Report for the AHRC Cultural Value Project, AHRC.

Jones, S. (2016) Wrestling with the Social Value of Heritage: Problems, Dilemmas and Opportunities. *Journal of Community Archaeology and Heritage*, 2016, 1-17.

Jones, S. Jeffrey, S. Maxwell, M. Hale, A. & Jones, C. (2017) 3D heritage visualisation and the negotiation of authenticity: the ACCORD project. *International Journal of Heritage Studies*, DOI: 10.1080/13527258.2017.1378905.

Jorgensen, A. Tylecote, M. (2007) Ambivalent landscapes – wilderness in the urban interstices. *Landscape Research*, 32(4) 443–462.

Kelly, R. (2014) Military Relief Models. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/story-of-the-map/milestones/ [Last accessed 29th October 2019].

Klekot, E. (2012) Constructing a 'monument of national history and culture' in Poland: the case of the Royal Castle in Warsaw. *International Journal of Heritage Studies*, 18(5) 459-478.

Lewis, N. (2000) The Climbing Body, Nature and the Experience of Modernity. *Body & Society*, 6 (3-4) 58-80.

Little, G. (2014) The Great Polish Map of Scotland: a geographer's perspective. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/visit-the-map/a-geographers-perspective/.

Lorimer, H. & Lund, K. (2003) Performing facts: finding a way over Scotland's mountains. *The Sociological Review*, 52(2) 130-144.

Lorimer, H. (1999) Ways of seeing the Scottish Highlands; Marginality, authenticity and the curious case of the Hebridean blackhouse. *Journal of Historical Geography*, 25(4) 517-533.

Lorimer, H. (2002) Sites of authenticity: Scotland's new parliament and official representations of the nation. Harvey et al (2002) (eds) *Celtic Geographies*. London: Routledge.

Lorimer H. (2003a) Telling Small Stories: Spaces of Knowledge and the Practice of Geography. *Transactions of the Institute of British Geographers*, 28(2) 197-217.

Lorimer H. (2003b) The geographical field course as active archive. *Cultural Geographies*, 10(3) 278-308.

Lorimer, H. (2005) Cultural geography: the busyness of being 'more-than-representational'. *Progress in Human Geography*, 29 (1) 83-94.

Lorimer, H. (2006) Herding memories of humans and animals. *Environment and Planning D: Society and Space*, 24 (4) 497-518.

Lorimer, H. (2007) Cultural geography: worldly shapes, differently arranged. *Progress in Human Geography*, 31(1) 89-100.

Lorimer H. (2008) Cultural geography: non-representational conditions and concerns. *Progress in Human Geography*, 32 (4) 51-559.

Lorimer, H. (2010) Caught in the Nick of Time: Archives and Fieldwork. D. DeLyser, S. Herbert, S. Aitkin, M. Crang, and L. McDowell, (eds.) 2010. *The SAGE Handbook of Qualitative Geography*. London: SAGE Publications.

Lorimer, H. Wylie, J. (2010) LOOP (a geography). Performance Research, 15 (4) 6-13.

Lorimer, H. (2013) St Peter's seminary, a 'glorious' gem given new life in the woods. 10th December, *The Guardian* [online] Available at: http://www.theguardian.com/uknews/scotland-blog/2013/dec/10/scotland-architecture-stpeters-seminary [Last accessed 29th October 2019].

Lorimer, H. (2014) Homeland. Cultural Geographies, 21(4) 583-604.

Lorimer, H. (2016) St Peter's seminary – its ruins remade by rippling, spectral light. 22nd March, *The Guardian* [online] Available at: https://www.theguardian.com/uk-news/scotland-blog/2016/mar/22/st-peters-seminary-its-ruins-remade-by-rippling-spectral-light. [Last accessed 29th October 2019].

Lowenthal, D. (1985) *The Past is a Foreign Country*. Cambridge: Cambridge University Press.

MacDonald, D. (2007) 'Dumby Dave - Dave MacLeod and the dark art of Rhapsody'. *Climbing Magazine*, December, no. 262.

MacDonald, F. (2013) The ruins of Erskine Beveridge. *Transactions of the Institute of British Geographers*, 39(4) 477-489.

MacDonald, F. (2013) Against Scottish Wildness. 17th July, *Bella Caledonia* [online] Available at: http://bellacaledonia.org.uk/2013/07/17/against-scottish-wildness/ [Last accessed 29th October 2019].

Macfarlane, R. (2016) Landmarks. London: Penguin.

Maclean, I. (1980) Mountain Men. In Kay, B (ed.) *Odyssey: Voices from Scotland's recent past*, 79-87. Edinburgh: Polygon Books.

Macleod, G. (2002) Identity, hybridity and the institutionalisation of territory: on the geohistoy of Celtic devolution. Harvey et al (2002) (eds.) *Celtic Geographies*. London: Routledge.

MacLeod, D. (2005) Happiness in Slavery. In Watson, J. (ed) *Stone Country: Bouldering in Scotland*. Glasgow: Stone Country Press.

MacPhail, I. M. M. (1979) Dumbarton Castle. Edinburgh: John Donald Publishers.

Matless, D. (2010) Describing Landscape: Regional Sites. *Performance Research*, 15(4) 72-82.

Matless, D. & Pearson, M. (2012) A regional conversation. *Cultural Geographies*, 19(1) 123-129.

Merriman, P. Revill, G. Cresswell, T. Lorimer, H. Matless, D. Rose, G. Wylie, J. (2008) Landscape, mobility, practice. *Social & Cultural Geography*, 9(2) 191-212.

Merleau-Ponty, M. (2005) Phenomenology of Perception. London: Routledge.

Montello, D (2002) Cognitive Map-Design Research in the Twentieth Century: Theoretical and Empirical Approaches. *Cartography and Geographic Information Science*, 29(3) 283-304.

Muir, R. (1999) *Approaches to Landscape*. London: Macmillan.

Murray, W.H. (1962) *Highland Landscape: A Survey*. Edinburgh: National Trust for Scotland.

Ness, S.A. (2011) Bouldering in Yosemite: Emergent Signs of Place and Landscape. *American Anthropologist*, 113(1) 71-86.

Nettlefold, P.A. & Stratford, E. (1999) The Production of Climbing Landscapes-as-Texts. *Australian Geographical Studies*, 37(2) 130-141.

Olwig, K. (1996) Recovering the Substantive Nature of Landscape. *Annals of the Association of American Geographers*, 86(4) 630-653.

Pearson, A (2002) Allied Military Model Making during World War II. *Cartography and Geographic Information Science*, 29(3) 227-241.

Pearson, M. & Shanks, M. (2001) *Theatre/Archaeology*. London: Routledge.

Pearson, M. (2006) << In Comes I>>: Performance, Memory and Landscape. Exeter: Exeter University Press.

Pearson, M. (2010) Site-specific performance. Basingstoke: Palgrave Macmillan.

Philo, C. (2004) The Changing Practices of Human Geography: An Introduction. In Cloke, P. et al (eds.) *Practising Human Geography*. London: Sage.

Pocock, D. (ed.) (1981) *Humanistic geography and literature: essays on the experience of place*. London: Croom Helm.

Pratt, G. (2009) Performance. In Gregory et al, (eds.) *The Dictionary of Human Geography*. Oxford: Wiley-Blackwell.

Prentice, T (ed.) (2004) Lowland Outcrops: Scottish Mountaineering Club Climbers' Guide. Edinburgh: The Scottish Mountaineering Trust.

Purkis, H. (2017) Making digital heritage about people's life stories. *International Journal of Heritage Studies*, 23(5) 434-444.

Relph, E. (1976) Place and Placelessness. London: Pion.

Richardson, C. (2012) Waste to Monument: John Latham's Niddrie Woman. *Tate Papers* [online] Available at: http://www.tate.org.uk/research/publications/tate-papers/waste-monument-john-lathams-niddrie-woman [Last accessed 29th October 2019]

Rickly, J.M. (2016) The (re)production of climbing space: bodies, gestures, texts. *Cultural Geographies*, 24(1) 69-88.

Riley, M. Harvey, D. (2006) Landscape Archaeology, Heritage and the Community in Devon: An Oral History Approach. *International journal of Heritage Studies*, 11(4) 269-288.

Riley, M. Harvey, D. (2007) Talking geography: on oral history and the practice of geography. *Social and Cultural Geography*, 8(3) 345-351.

Robinson, T. (2008) Stones of Arran: Pilgrimage. London: Faber & Faber.

Rogers, A. (2012) Geographies of the Performing Arts: Landscapes, Places and Cities. *Geography Compass*, 6(2) 60-75.

Sanzaro, F. (2013) *The Boulder: A Philosophy for Bouldering*. Glasgow: Stone Country Press.

Sarlöv Herlin, I. (2016) Exploring the national contexts and cultural ideas that preceded the Landscape Character Assessment method in England. *Landscape Research*, 41(2) 175-185.

Sather-Wagstaff, J. (2015) Heritage and Memory. In Waterton E, Watson. S. (eds.) (2015) *The Palgrave Handbook of Contemporary Heritage Research*. New York: Palgrave Macmillan.

Scottish Landscape Forum (2007) Scotland's Living Landscape's Report Summary Leaflet. *Scottish Landscape Forum* [online] Available at: https://www.nature.scot/scotlands-living-landscapes-places-people-published-report-summary-leaflet [Last accessed 29th October 2019].

Scottish Natural Heritage (2002) Natural Heritage Zones: A National Assessment of Scotland's Landscapes. *Scottish Natural Heritage* [online] Available at: https://www.nature.scot/natural-heritage-zones-national-assessment-scotlands-landscapes [Last accessed 29th October 2019].

Seamon, D. (1979) A Geography of the Lifeworld: Movement, Rest, and Encounter. New York: St. Martin's.

Shields, B. (1964) *Guide to the Bouldering Problems of Dumbarton Rock* (The Winfield guide) Unpublished.

Shields, B. (1975) Dumbarton Rock. In *Glasgow Outcrops: A Guide to the Climbing in and around Glasgow*. Glasgow: Highrange Sports.

Shields, T. (1992) Winners and Losers in the Black Barony Affair. 15th May, *The Herald* [online] Available online:

https://www.heraldscotland.com/news/11945002.Winners_and_losers_in_the_Black_Baro ny affair/ [Last accessed 29th October 2019].

Smith, L. (2006) Uses of Heritage, London: Routledge.

Steinitz, C. (2008) Landscape planning: A brief history of influential ideas. *Journal of Landscape Architecture*, 3(1) 68-74.

Storm, A. (2014) Post-Industrial Landscape Scars. New York: Palgrave Macmillan.

Swanwick, C. (2002) *Landscape character assessment: Guidance for England and Scotland*. Battleby/Cheltenham: Scottish Natural Heritage/The Countryside Agency.

Szewczuk, J. (2005) Skocja w Skocja. 25 lat Zakladu Kartografii I Teledetekcji. Uniwersytet Jagiellonski: Krakow. Translated by Chuchra, K. (2009).

Tabraham, C. (2005) *Dumbarton Castle*. Edinburgh: Historic Scotland.

Taylor, J. (2006) Mapping adventure: a historical geography of Yosemite Valley climbing landscapes. *Journal of Historical Geography*, (32) 190-219.

Taylor, M. (1981) *Dumbarton: at work & play*. Dumbarton District Libraries: Dumbarton.

Thomas, J. (2001) Archaeologies of Place and Landscape. In Hodder, I. (ed) (2001) *Archaeological Theory Today*. Oxford: Blackwell.

Thompson, I. Howard, P. Waterton, E. (2013) Introduction. In Thompson I. Howard, P. Waterton, E. (eds.) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Thrift, N. (1996) Spatial Formations. London: Sage.

Thrift, N. (2000) Afterwords. *Environment and Planning D: Society and Space*, (18) 213-255.

Thrift, N. and Dewsbury, J.D. (2000) Dead geographies, and how to make them live again. *Environment and Planning D: Society and Space*, (18) 411-32.

Traynor, K. (2014) The Great Polish Map of Scotland. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/wp-content/uploads/2014/11/HISTORY-SCOTLAND-ARTICLE.pdf [Last accessed 29th October 2019].

Tuan, Yi Fu (1976) Humanistic Geography. *Annals of the Association of American Geographers*, 66 (2) 266-276.

Tudor, C. (2014) An Approach to Landscape Character Assessment, Natural England.

Turner, S. (2013) Landscape Archaeology. In Howard, P. Thompson, I. Waterton, E. (eds) (2013) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Waterton, E. Smith, L. (2010) The recognition and misrecognition of community heritage. *International Journal of Heritage Studies*, 16(1-2) 4-15.

Waterton, E. (2013) Landscape and non-representational theories. In Howard, P. Thompson, I. Waterton, E. (eds) *The Routledge companion to landscape studies*. New York: Taylor & Francis.

Waterton, E. Watson, S. (2013) Framing Theory: towards a critical imagination in heritage studies. *International Journal of Heritage Studies*, 19(6) 546-561.

Waterton, E. Watson, S. (2015) Heritage as a Focus of Research: Past, Present and New Directions. In Waterton E, Watson. S. (eds.) (2015) *The Palgrave Handbook of Contemporary Heritage Research*. New York: Palgrave Macmillan.

Watson, S. Waterton E. (2010) Heritage and community engagement. *International Journal of Heritage Studies*, 16(1-2) 1-3.

Watson, J. (2005) Stone Country: Bouldering in Scotland. Glasgow: Stone Country Press.

Watson, J. (2007) Stone Play: The Art of Bouldering. Glasgow: Stone Country Press.

Watson, J. (2013) *Dumby Bloc: A Stone Country Guide to 300 Boulder Problems at Dumbarton Rock*. Glasgow: Stone Country Press.

Williams, H. (2012) Dumbarton Rock graffiti clean-up concern raised by climbers. 16th July, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotland-glasgow-west-18841808 [Last accessed 29th October 2019].

Witcher, R. Tolia-Kelly, D. Hingley, R (2010) Archaeologies of Landscape: Excavating the Materialities of Hadrian's Wall. *Journal of Material Culture*, (15) 105-128.

Withers, C. (1992) The historical creation of the Scottish Highlands. In Donnachie, I. Whatley, C. (1992) (eds) *The Manufacture of Scottish History*, Edinburgh: Polygon.

Worpole, K. Orton, J. (2013) *The New English Landscape*. London: Field Station.

Wu, Z. Hou, S. (2015) Heritage and Discourse. In Waterton E, Watson. S. (eds.) (2015) *The Palgrave Handbook of Contemporary Heritage Research*. New York: Palgrave Macmillan.

Wylie, J. (2005) A single day's walking: narrating self and landscape on the South West Coast Path. *Transactions of the Institute of British Geographers*, 30(2) 234-247.

Wylie, J. (2006) Depths and folds: on landscape and the gazing subject. *Environment and Planning D: Society and Space*, (24) 519–535.

Wylie, J. (2006) Smoothlands: fragments/landscape/fragments. *Cultural Geographies*, 13(3) 458-465.

Wylie, J. (2007) Landscape. Oxford: Routledge.

Wylie, J. (2013) Landscape and phenomenology. In Howard, P. Thompson, I. Waterton, E. (eds) (2013) The Routledge companion to landscape studies. New York: Taylor & Francis.

Wylie (2014) Landscape. in Cloke, P. Crang, P. Goodwin, M. (eds) (2014) *Introducing Human Geographies*. New York: Routledge.

Other Sources

¹ VisitScotland (2019) Highlands Regional Factsheet 2017. *Visit Scotland* [online] Available at: https://www.visitscotland.org/binaries/content/assets/dot-org/pdf/research-papers-2/highlands-and-islands-regional-factsheet-2017-v2.pdf [Last accessed 29th October 2019].

² VisitScotland (2019) Highlands, Research and Insights. *Visit Scotland* [online] Available at: https://www.visitscotland.org/research-insights/regions/highlands [Last accessed 29th October 2019].

³ BBC News (2019) Hydro power 'threat' to Skyfall's Glen Etive. 20th March, *BBC News* [online]. Available at: https://www.bbc.co.uk/news/uk-scotland-highlands-islands-47626650 [Last accessed 29th October 2019].

⁴ Royal Geographical Society (2013) Discovering Britain: Ruination and reinvention: A self guided walk around the Kilmahew estate near Cardross. *Royal Geographical Society* [online]. Available at: https://www.discoveringbritain.org/content/discoveringbritain/walk%20booklets/Kilmahe w%20walk%20-%20written%20guide.pdf [Last accessed 29th October 2019].

⁵ The Invisible College (2013) Homepage. *The Invisible College* [online] Available at: https://www.theinvisiblecollege.org.uk/ [Last accessed 29th October 2019].

⁶ NVA (2016) Hinterland. *NVA* [online] Available at: http://nva.org.uk/artwork/hinterland/ [Last accessed 29th October 2019].

⁷ BBC News (2018) St Peter's Seminary rescue arts group to close. 5th June, *BBC* News [online]: Available at: https://www.bbc.co.uk/news/uk-scotland-44373883 [Last accessed 29th October 2019].

⁸ Forestry and Land Scotland (2017) Guide Map to Cuningar Loop Woodland Park. *Forestry and Land Scotland* [online]: Available at: https://forestryandland.gov.scot/visit/cuningar-loop [Last accessed 29th October 2019].

⁹ Forestry and Land Scotland (2017) Guide Map to Cuningar Loop Woodland Park. *Forestry and Land Scotland* [online]: Available at: https://forestryandland.gov.scot/visit/cuningar-loop [Last accessed 29th October 2019].

¹⁰ Winnett, J. (2019) The Cuningar Stones: The Reservoir Stone. *axisweb* [online]: Available at: https://www.axisweb.org/p/jameswinnett/workset/226232-the-cuningar-stones-the-reservoir-stone/ [Last accessed 29th October 2019].

¹¹ Serious Climbing (2019.) Glasgow Cuningar Boulder Park. *Serious Climbing* [online]: Available at: https://seriousclimbing.com/cuningarloopboulders/ [Last accessed 29th October 2019].

¹² Climb Scotland (2019) The Cuningar Loop: Scotland's first outdoor bouldering park. *Climb Scotland* [online] Available at: http://www.climbscotland.net/where-to-go/get-outdoors/cuningar-loop-boulders [Last accessed 29th October 2019].

¹³ Landschaftpark Duisburg-Nord (2019) Climbing Garden. *Landschaftpark Duisburg-Nord* [online] Available at: https://www.landschaftspark.de/en/leisure-activities/climbing-garden/ [Last accessed 29th October 2019].

¹⁴ Scottish Natural Heritage (2019) Landscape Character Assessment in Scotland. *Scottish Natural Heritage* [online] Available at: https://www.nature.scot/professional-advice/landscape/landscape-character-assessment/landscape-character-assessment-scotland [Last accessed 29th October 2019].

¹⁵ Heritage Lottery Fund (2019) Our Work. *Heritage Lottery Fund* [online] Available at: https://www.heritagefund.org.uk/our-work [Last accessed 29th October 2019].

¹⁶ BBC News (2013) Plan dropped to end cone tradition on Glasgow's Wellington statue. 12th November, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotland-glasgow-west-24907190 [Last accessed 29th October 2019].

¹⁷ University of York Archaeology (2019) ACCORD Project: Dumbarton Rock, Sea Boulder 3D Model. *Sketchfab* [online] Available at: https://sketchfab.com/3d-models/accord-project-dumbarton-rock-sea-boulder-20f6f682cca2404e92dd3589a8ae54f8 [Last accessed 29th October 2019].

¹⁸ Dumby.info (2019) Facebook community page. *Dumby.info* [online] Available at: https://www.facebook.com/dumby.info/ [Last accessed 29th October 2019].

¹⁹ Mapa Scotland (2019) Homepage. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/ [Last accessed 29th October 2019].

²⁰ Ross, S. (2018) Soldier's 3D map of Scotland celebrates Polish independence. 3rd March, *The Scotsman* [online] Available at: https://www.scotsman.com/news-2-15012/soldier-s-3d-map-of-scotland-celebrates-polish-independence-1-4700109 [Last accessed 29th October 2019].

²¹ Mapa Scotland (2019) Facebook community page. *Mapa Scotland* [online] Available at: https://www.facebook.com/mapascotland/ [Last accessed 29th October 2019].

²² TripAdvisor (2019) The Great Polish Map of Scotland. *TripAdvisor* [online] Available at: https://www.tripadvisor.co.uk/Attraction_Review-g1900761-d7234223-Reviews-The_Great_Polish_Map_of_Scotland-Eddleston_Scottish_Borders_Scotland.html [Last accessed 29th October 2019].

- ²³ BBC Scotland (2017) The hidden map of Scotland. 13th October, *BBC Scotland* [online video] Available at: https://www.facebook.com/watch/?v=1885160241513732 [Last accessed 29th October 2019].
- ²⁴ Dumby.info (2019) Facebook community page. *Dumby.info* [online] Available at: https://www.facebook.com/dumby.info/ [Last accessed 29th October 2019].
- ²⁵ Black Diamond Equipment (2016) Dumbarton Days: Babsi Zangerl and Jacopo Larcher Explore Scotland's Trad Testpieces. 5th July, *Black Diamond Equipment* [online video] Available at: https://www.youtube.com/watch?v=ugS2YRV0PLs [Last accessed 29th October 2019].
- ²⁶ UKC (2019) Dumbarton Rock crag database. *UKC* [online] Available at: https://www.ukclimbing.com/logbook/crag.php?id=189 [Last accessed 29th October 2019].
- ²⁷ UKC (2019) Windjammer Crack public logbook. *UKC* [online] Available at: https://www.ukclimbing.com/logbook/c.php?i=3411 [Last accessed 29th October 2019].
- ²⁸ National Library of Scotland (2019) Dumbarton Their Ma'ties Castle of Dumbritton from the West. *National Library of Scotland* [online] Available at: https://digital.nls.uk/slezer/engraving/?sl=4 [Last accessed 29th October 2019].
- ²⁹ Royal Collection Trust (2019) Dumbarton Castle. *Royal Collection Trust* [online] Available at: https://www.rct.uk/collection/980026-e [Last accessed 29th October 2019].
- ³⁰ Historic Environment Scotland (2019) Dumbarton Castle Scheduled Monument. *Historic Environment Scotland* [online] Available at: http://portal.historicenvironment.scot/designation/SM90107 [Last accessed 29th October 2019].
- ³¹ Historic Environment Scotland (2019) About Us. *Historic Environment Scotland* [online] Available at: https://www.historicenvironment.scot/about-us/ [Last accessed 29th October 2019].
- ³² Scottish Natural Heritage (2019) Dumbarton Rock SSSI. *Scottish Natural Heritage* [online] Available at: http://gateway.snh.gov.uk/sitelink/siteinfo.jsp?pa_code=551 [Last accessed 29th October 2019].
- ³³ Marshall, J. (circa 1960s) Personal letter to Brian Shields. Shields Family Collection

- ³⁴ Planet Mountain (2015) Caroline Ciavaldini Requiem Video at Dumbarton Rock. 22nd April, *Planet Mountain* [online video] Available at: http://www.planetmountain.com/en/news/climbing/caroline-ciavaldini-requiem-video-at-dumbarton-rock.html [Last accessed 29th October 2019].
- ³⁵ Pohl, B. (2016) Achemine, E9 6c by Barbara Zangerl. 6th May, *UKC* [online] Available at: https://www.ukclimbing.com/news/2016/05/achemine_e9_6c_by_barbara_zangerl-70435 [Last accessed 29th October 2019].
- ³⁶Ryan, M. (2006) Dave MacLeod, The Modern Traditionalist. 10th April, *UKC* [online] Available at:
- https://www.ukclimbing.com/articles/features/dave_macleod_the_modern_traditionalist_e11-198 [Last accessed 29th October 2019].
- ³⁷ BBC News (2006) Film documents extreme rock climb. 20th October, *BBC News* [online] Available at: http://news.bbc.co.uk/1/hi/scotland/6068376.stm [Last accessed 29th October 2019].
- ³⁸ Trotter, S. (2008) A moment to remember! 9th June, *Sonnie Trotter* [blog] Available at: https://sonnietrotter.com/2008/06/09/a-moment-to-remember/ [Last accessed 29th October 2019].
- ³⁹ MacLeod, D. (2007) Leaving Dumbarton. 6th July, *Dave MacLeod* [blog] Available at: http://davemacleod.blogspot.com/2007/07/leaving-dumbarton.html [Last accessed 29th October 2019].
- ⁴⁰ UKC (2019) Dumbarton Rock crag database. *UKC* [online] Available at: https://www.ukclimbing.com/logbook/crag.php?id=189 [Last accessed 29th October 2019].
- ⁴¹ Shields, J. (2017) Dumbarton Rock climbing history. 29th September [email]
- ⁴² Middendorf, J. (n.d.) Explanation of the A1 to A5 grading system for aid-climbing pitches. *Bigwalls.net* [online] Available at: http://www.bigwalls.net/climb/Ratings.html [Last accessed 29th October 2019].
- ⁴³ Interview with Dave MacLeod, Dumbarton, 04/09/08
- ⁴⁴ UKC, (2019) Toto public logbook, *UKC* [online] Available at: https://www.ukclimbing.com/logbook/c.php?i=47260 [Last accessed 29th October 2019].

- ⁴⁵ Macfarlane, R. (2018) Word of the day. 22nd June, *Twitter* [online] Available at: https://twitter.com/robgmacfarlane/status/1010402134133796866?lang=en [Last accessed 29th October 2019].
- ⁴⁶ Interview with Andy Gallagher, Glasgow, 14/10/19
- ⁴⁷ Boreal Outdoor (2015) History. *Boreal Outdoor* [online] Available at: http://www.borealoutdoor.com/about-us/history [Last accessed 29th October 2019].
- ⁴⁸ Doyle, J. (2018) Rock climbing shoe buyers guide. 20th April, *Rock & Run* [online] Available at: https://rockrun.com/blogs/product-information/rock-climbing-shoe-buyers-guide [Last accessed 29th October 2019].
- ⁴⁹ Association of Leading Visitor Attractions (2019) Visits made in 2018 to visitor attractions in membership with ALVA. *ALVA* [online] Available at: https://www.alva.org.uk/details.cfm?p=609 [Last accessed 29th October 2019].
- ⁵⁰ Oxford English Dictionary (2019) 'Graffiti'. *Oxford English Dictionary* [online] Available at: https://en.oxforddictionaries.com/definition/graffiti [Last accessed 29th October 2019].
- ⁵¹ The Dumbarton Reporter (2012) Anger at Castle's Ghastly Grounds. 5th April, *The Dumbarton Reporter* [online] Available at: http://www.dumbartonreporter.co.uk/news/thisweek/articles/2012/05/04/428369-anger-at-castles-ghastly-grounds/ [Last accessed 29th October 2019].
- ⁵² Mountaineering Scotland (2019) Homepage. *Mountaineering Scotland* [online] Available at: https://www.mountaineering.scot/ [Last accessed 29th October 2019].
- ⁵³ Watson, J. (2012) Dumbarton Rock update. 4th July, *Stone Country Press* [blog] Available at: https://www.stonecountrypress.co.uk/2012/07/dumbarton-rock-update.html [Last accessed 29th October 2019].
- ⁵⁴ BBC Radio 2 (2012) The Jeremy Vine Show, 17th July, *BBC Radio* 2 [online] Available at: https://www.bbc.co.uk/programmes/b01ks2j6 [Last accessed 29th October 2019].
- ⁵⁵ The Scotsman (2012) Don't wipe graffiti off volcanic rock, demand climbers. 17th July, *The Scotsman* [online] Available at: https://www.scotsman.com/news/environment/don-t-wipe-graffiti-off-volcanic-rock-demand-climbers-1-2415384/amp [Last accessed 29th October 2019].

- ⁵⁶BBC News (2013) Clean-up operation removes graffiti from Dumbarton Rock. 15th March, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotland-glasgow-west-21806641 [Last accessed 29th October 2019].
- ⁵⁷ University of York Archaeology (2019) ACCORD Project: Dumbarton Rock, Sea Boulder 3D Model. *Sketchfab* [online] Available at: https://sketchfab.com/3d-models/accord-project-dumbarton-rock-sea-boulder-20f6f682cca2404e92dd3589a8ae54f8 [Last accessed 29th October 2019].
- ⁵⁸ Archaeology Data Service (2017) ACCORD with Rock-Climbers at Dumbarton Rock. *Archaeology Data Service* [online] Available at: http://archaeologydataservice.ac.uk/archives/view/dumbarton_ahrc_2015/index.cfm [Last accessed 29th October 2019].
- ⁵⁹ Historic Environment Scotland (2017) Dumbarton Castle Statement of Significance. *Historic Environment Scotland* [online] Available at: https://www.historicenvironment.scot/archives-and-research/publications/publication/?publicationid=907e4567-610d-447d-966e-a75300e26948 [Last accessed 29th October 2019].
- ⁶⁰ NVA (2005) The Storr. *NVA* [online] Available at: http://nva.org.uk/artwork/storr/ [Last accessed 29th October 2019].
- ⁶¹ NVA (2016) Hinterland. *NVA* [online] Available at: http://nva.org.uk/artwork/hinterland/ [Last accessed 29th October 2019].
- ⁶² The Dumbarton Reporter (2008) Floodlight Plan Snuffed. 4th March, *The Dumbarton Reporter* [online] Available at: https://www.dumbartonreporter.co.uk/news/13955143.floodlight-plan-snuffed/ [Last accessed 29th October 2019].
- ⁶³ West Dunbartonshire Council (2015) Dumbarton Rock Charette. *West Dunbartonshire Council* [online] Available at: https://www.west-dunbarton.gov.uk/planning-building-standards/dumbarton-rock-charrette/ [Last accessed 29th October 2019].
- ⁶⁴ Wahlquist, C. (2019) Grampians rock-climbing ban: Indigenous group says heritage is non-negotiable. 2nd July, *The Guardian* [online] Available at: https://www.theguardian.com/australia-news/2019/jul/02/grampians-rock-climbing-ban-could-be-softened-if-cultural-heritage-respected [Last accessed 29th October 2019].

- ⁶⁵ MacLeod, D. (2007) Leaving Dumbarton. 6th July, *Dave MacLeod* [blog] Available at: http://davemacleod.blogspot.com/2007/07/leaving-dumbarton.html [Last accessed 29th October 2019].
- ⁶⁶ Gittings, B. (n.d.) Polish Map of Scotland. *Gazetteer for Scotland* [online] Available at: https://www.scottish-places.info/features/featurefirst19323.html [Last accessed 29th October 2019].
- ⁶⁷ TripAdvisor (2019) 'The Great Polish Map of Scotland'. *TripAdvisor* [online] Available at: https://www.tripadvisor.co.uk/Attraction_Review-g1900761-d7234223-Reviews-The_Great_Polish_Map_of_Scotland-Eddleston_Scottish_Borders_Scotland.html [Last accessed 29th October 2019].
- ⁶⁸ BBC News (2018) Great Polish Map of Scotland to be unveiled. 6th March, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotland-south-scotland-43293460 [Last accessed 29th October 2019].
- ⁶⁹ Mapa Scotland (2019) Homepage. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/ [Last accessed 29th October 2019].
- ⁷⁰ Currie, J. (2018) Relief map celebrates bond between Scotland and Poland. 10th August, *The Southern Reporter* [online] Available at: https://www.thesouthernreporter.co.uk/news/people/relief-map-celebrates-bond-between-scotland-and-poland-1-4782235 [Last accessed 29th October 2019].
- ⁷¹ Gittings, B. (n.d.) Polish Map of Scotland. *Gazetteer for Scotland* [online] Available at: https://www.scottish-places.info/features/featurefirst19323.html [Last accessed 29th October 2019].
- ⁷² Gasiorek, J. (n.d.) General Maczek a hero amongst us. *Polish Scottish Heritage* [online] Available at: http://polishscottishheritage.co.uk/?heritage_item=hero-amongst-us [Last accessed 29th October 2019].
- ⁷³ Interview with Keith Burns, Edinburgh, 01/05/18
- ⁷⁴ Interview with Tomasz Trafas, Krakow, 01/06/17
- ⁷⁵ Interview with Tomasz Trafas, Krakow, 01/06/17
- ⁷⁶ TripAdvisor (2019) The Great Polish Map of Scotland. *TripAdvisor* [online] Available at: https://www.tripadvisor.co.uk/Attraction_Review-g1900761-d7234223-Reviews-

The_Great_Polish_Map_of_Scotland-Eddleston_Scottish_Borders_Scotland.html [Last accessed 29th October 2019].

⁷⁷ Mapa Scotland (2013) People and the Map. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/visit-the-map/people-and-the-map/ [Last accessed 29th October 2019].

⁷⁸ Interview with Keith Burns, Edinburgh, 01/05/18

⁷⁹ Mapa Scotland (2014) January 2014: Restoration phase begins. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/2013/11/efforts-for-national-recognition-at-2012-agm/ [Last accessed 29th October 2019].

⁸⁰ Interview with Keith Burns, Edinburgh, 01/05/18

⁸¹ Historic Environment Scotland (2012) The Great Polish Map of Scotland, Listed Building). *Historic Environment Scotland* [online] Available at: http://portal.historicenvironment.scot/designation/LB51957,polish%20map) [Last accessed 29th October 2019].

⁸² Interview with Tomasz Trafas, Krakow, 01/06/17

⁸³ The Scottish Parliament (2012) Meeting of the Scottish Parliament. 19th September, *The Scottish Parliament* [online] Available at: http://www.parliament.scot/parliamentarybusiness/report.aspx?r=7927&i=72188 [Last accessed 29th October 2019].

⁸⁴ The Scottish Parliament (2012) Meeting of the Scottish Parliament. 19th September, *The Scottish Parliament* [online] Available at: http://www.parliament.scot/parliamentarybusiness/report.aspx?r=7927&i=72188 [Last accessed 29th October 2019].

⁸⁵ Interview with Tomasz Trafas, Krakow, 01/06/17

⁸⁶ Mapa Scotland (2013) Our Supporters and Sponsors. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/home/our-supporters-and-sponsors/ [Last accessed 29th October 2019].

⁸⁷ Mapa Scotland (2019) Facebook page. *Facebook* [online] Available at: https://www.facebook.com/mapascotland/ [Last accessed 29th October 2019].

- ⁸⁸ Burns, K. (2015) Progress at December 2015. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/progress-at-december-2015-2/ [Last accessed 29th October 2019].
- ⁸⁹ Burns, K. (2014) Review of 2014. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/latest-news/ [Last accessed 29th October 2019].
- ⁹⁰ Burns, K. (2015) Progress at December 2015. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/progress-at-december-2015-2/ [Last accessed 29th October 2019].
- 91 Interview with Keith Burns, Edinburgh, 01/05/18
- ⁹² Burns, K. (2015) Progress at December 2015. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/progress-at-december-2015-2/ [Last accessed 29th October 2019].
- ⁹³ Burns, K. (2016) Progress at November 2016. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/progress-at-november-2016/ [Last accessed 29th October 2019].
- ⁹⁴ Burns, K. (2018) Progress Report at February 2018. *Mapa Scotland* [online] Available at: http://www.mapascotland.org/4070-2/ [Last accessed 29th October 2019].
- 95 Burns, K. (2017) Mapa painting. 2nd September [email]
- ⁹⁶BBC Scotland (2017) The hidden map of Scotland. 13th October, *BBC Scotland* [online video] Available at: https://www.facebook.com/watch/?v=1885160241513732 [Last accessed 29th October 2019].
- ⁹⁷ Barony Castle Hotel (2019) The History of Barony Castle. *Barony Castle Hotel* [online] Available at: https://www.baronycastle.com/about-barony-castle/the-history-of-barony-castle/ [Last accessed 29th October 2019].
- ⁹⁸ Burns, K. (2017) Mapa working party. 1st July [email]
- ⁹⁹ The Scottish Government (2018) Strengthening Scottish-Polish ties. *The Scottish Government* [online] Available at: https://news.gov.scot/news/strengthening-scottish-polish-ties [Last accessed 29th October 2019].

- ¹⁰⁰ Wikipedia (2019) Duns, Polish War Memorial. *Wikipedia* [online] Available at: https://en.wikipedia.org/wiki/Duns#Polish_War_Memorial [Last accessed 29th October 2019].
- ¹⁰¹ BBC News (2016) Statue of Polish 'Soldier Bear' to be unveiled in Duns. 8th April, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotland-south-scotland-35997020 [Last accessed 29th October 2019].
- ¹⁰² BBC News (2017) Soldier bear statue unveiled in Edinburgh's Princes Street Gardens. 23rd January, *BBC News* [online] Available at: https://www.bbc.co.uk/news/uk-scotlandedinburgh-east-fife-34748795 [Last accessed 29th October 2019].
- ¹⁰³ Millar, J. (2018) Statue of WWII Polish hero unveiled by Lady Fraser. 5th November, *The Courier* [online] Available at: https://www.thecourier.co.uk/fp/news/local/angus-mearns/758293/statue-of-wwii-polish-hero-unveiled-by-lady-fraser/ [Last accessed 29th October 2019].
- ¹⁰⁴ Stando, O. (2019) Immigration is good for Scotland we'll always stand up for it. 29th January, *The Scottish National Party* [online] Available at: https://www.snp.org/immigration-is-good-for-scotland-well-always-stand-up-for-it/ [Last accessed 29th October 2019].
- ¹⁰⁵ Historic Environment Scotland (2018) 3D Model of the Great Polish Map of Scotland. *Sketchfab* [online] Available at: https://sketchfab.com/3d-models/the-great-polish-map-of-scotland-834d6a3c221847cf8a3ec2b0fc0a9ff3 [Last accessed 29th October 2019].
- ¹⁰⁶ TripAdvisor (2019) The Great Polish Map of Scotland. *TripAdvisor* [online] Available at: https://www.tripadvisor.co.uk/Attraction_Review-g1900761-d7234223-Reviews-The_Great_Polish_Map_of_Scotland-Eddleston_Scottish_Borders_Scotland.html [Last accessed 29th October 2019].
- ¹⁰⁷ TripAdvisor (2019) The Great Polish Map of Scotland. *TripAdvisor* [online] Available at: https://www.tripadvisor.co.uk/Attraction_Review-g1900761-d7234223-Reviews-The_Great_Polish_Map_of_Scotland-Eddleston_Scottish_Borders_Scotland.html [Last accessed 29th October 2019].
- ¹⁰⁸ Interview with Keith Burns, Edinburgh, 01/05/18
- $^{109}\,\mathrm{Mapa}$ Scotland (2017) Minutes from Trustee Meeting. 26^{th} November, Barony Castle Hotel.

- ¹¹⁰ Mapa Scotland (2017) Minutes from Trustee Meeting. 26th November, Barony Castle Hotel.
- ¹¹¹ Interview with Keith Burns, Edinburgh, 01/05/18
- ¹¹² Mapa Scotland (2017) Minutes from Trustee Meeting. 26th November, Barony Castle Hotel.
- 113 Interview with Keith Burns 01/05/18
- ¹¹⁴ Interview with Keith Burns 01/05/18