COLLECTIVE MEMORY AS AFFIRMATION

People-centered cultural heritage in a digital age

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Introduction

Over the last 15 years, the character of the public administration of cultural heritage – long based on rigid standards of authenticity and monumentality – has undergone a far-reaching change (Araoz 2011). As most powerfully expressed by the 2003 United Nations Educational, Scientific and Cultural Organization (UNESCO) Convention for Safeguarding the Intangible Cultural Heritage, intangible cultural heritage and, by extension, all of cultural heritage, is 'constantly recreated by communities and groups in response to their environment, their interaction with nature and their history, and provides them with a sense of identity and continuity' (UNESCO 2003). This wholehearted acceptance of re-creation and adaptation as essential aspects of heritage significance places a new emphasis on process rather than product, thus opening up exciting new potential for digital technologies as facilitators of peoplecentered cultural heritage.

This chapter will examine the potential of social media as a framework for such community-based heritage activities. These applications provide varying combinations of visual, spatial and auditory representations that can be contributed to (or commented upon) by individuals, yet which also simultaneously comprise a constantly changing and expanding mosaic of collective memory. Case studies of digital applications and innovative uses of online social networks will be presented, demonstrating the richness of a dynamic, ever-evolving, participatory heritage praxis quite distinct from the older, static conceptions of heritage as unambiguous, expert-defined and needing *protection* from the forces of change.

This kind of interactive heritage – like traditional collective memory – is continuously transformed as a kind of meta-history itself. The role of heritage curators and conservators in the coming years must therefore become increasingly that of facilitators rather than authoritative scripters and arbiters of authenticity

and significance. Although professional expertise in historiographical method, heritage policy and site management will certainly always be useful, in a digital world of multivocality of memory, these skills will not be the only ones. The task of heritage professionals will be rather to enable contemporary communities to digitally (re)produce historical environments, collective narratives and geographical visualizations that cluster individual perspectives into shared forms and processes of remembering. These interactions are reminiscent of the conversations that once occurred much more frequently at corner bars, in town squares and by evening campfires (cf. Putnam 2001) as a vital part of the exercise of cultural diversity that is now seen as a central component of world heritage (UNESCO 2005).

Un-inventing heritage: the transformatory power of participation

The acceptance of carefully designed and authoritatively presented narratives as the normative structure for public heritage communication is a tradition that extends back for centuries (Silberman 1995). From Herodotus, through medieval pilgrim guides, through the national monuments and heritage sites of the present, the main trajectory of communication has been from an author or an expert to a reader or hearer, relating a sequence of carefully chosen details, often with a subtext of contemporary political significance. As modern Western nations adopted official versions of their national story - to be taught in public schools and transmitted through national park systems - collective memory became a Janus-faced phenomenon. Official public commemoration projected forward into future generations of nationaland international-scale human societies, while private collective memories looked backward through more localized and intimately performed narratives of a smaller, more circumscribed, but nonetheless shared past. And although the audience for state-sponsored heritage was never completely passive (neither accepting the authorized narrative at face value or refraining from expressing one's own reaction) that interactivity remained largely unacknowledged by public institutions and was rarely used to enrich the public interpretation of the heritage itself. In important ways, that popular or individual reaction to official interpretation has carried the character of rumor, ridicule or gossip - frowned upon by the institutions of the state and its educational system, but enormously important in constructing unofficial communities of sympathy (Fine 2007).

This sort of unofficial, community-based reaction to official heritage narratives has, throughout history, thrived on all kinds of alternative conspiracy theories and explanations that have contested the official version. Groups and sometimes especially creative and persuasive individuals have used these counter-narratives to give voice to feelings of historical exclusion or disempowerment. Whether it was the popular explanations of the Ten Lost Tribes, the Moundbuilders, the Von Däniken thesis, Velikovskyism, JFK conspiracy theories, or even the wild rumors of responsibility for the 9/11 attacks on the Twin Towers, disenfranchised sectors of the public have been able to contribute to the interpretation of public events and icons

only by contesting the power of the authorities as being intentionally deceptive and or factually incorrect. At times, these contests can and do spill over into an equally unambiguous and exclusionary nostalgia. It is expressed in the kind of scorchedearth xenophobic nationalism that currently fuels anti-immigrant sentiment and propels religious fundamentalism into the center of political discourse all across the world (Roy 2010). It is manifested in pitched battles at national and local levels over the relative purity and authenticity of history textbook narratives (Castenell and Pinar 1993). In both these forms – the official and the reactionary – lies an assertion that there is only one truth to be had, accessible only through narratives that are inherently authoritarian and didactic.

None of the competing claims for a totalizing, absolute truth reflect the socially inclusive and fluid modality of genuinely collective memory. Indeed the alternatives in the realm of collective memory have always flown beneath the radar in a series of face-to-face or family encounters, almost always transmitted orally, that describe a different warp and weave of time. Instead of interpreting and tracing the history of the big heritage subjects like technological progress, the succession of aesthetic styles through history, and the rise and fall of nations, it has produced a thick anecdotal description of how the world works based on membership in a social collectivity (Zerubavel 1996). That membership can be read simultaneously on many levels: in the place names of a particular territory, in the recipes prepared on special occasions, in a yearly round of holidays linked to religious or cultural traditions, and, of course, in the telling of family stories at gatherings of kin. In whatever its form, it remains (with the exception of the examples systematically collected by modern folklorists, from the Grimm brothers onward) largely unrecorded and borne through time by the active exercise of identity. In other words, it is what Paul Connerton (1989) identifies as 'performative memory' that absolutely requires the personal, physical participation of its adherents, not merely an assent to or passive acceptance of an official historical narrative.

Even as collective memory on the local and family level has been progressively shattered in industrialized nations by globalizing mobility, urbanization, suburbanization and the disintegration of extended families in individual-centered service economies (Connerton 2009), some pockets of viable community and family 'performative' identity still exists. As we will suggest in the following pages, the active awareness and performance of shared habits, places, celebrations and recollections is a vital channel of human communication (and not only intergenerational inheritance) in healthy and dynamic societies (cf. Misztal 2003). No wonder then, that as a vibrant, collective consciousness of the past has progressively receded in large segments of the industrialized world, a hunger for personal connection with ancient places, traditions and customs has arisen alongside 'official' heritage narratives.

The interactive element in public heritage interpretation was never completely absent in the historical sites and initiatives that steadily increased in the Industrial Age. The birth of house museums (West 1999); the proliferation of communityinspired historical pageants (Glassberg 1990); the establishment of open air museums (Rentzhog 2007); and the evolution of historical re-enactments (McCalman and Pickering 2009) merged the hunger for older and apparently more stable ways of life with routinized visits to what might today be called an 'immersive environment' (Lowenthal 2002). Yet even in these mass-produced venues for performative memory, there remains a sharp distinction between those that remained faithful to officially dictated narrative and academically authenticated facticity (at places like Plimoth Plantation and Colonial Williamsburg in the US, Bokrijk in Belgium, and Skansen in Sweden among others), and the eclectic and creatively anachronistic Renaissance Fairs, Wild West towns, and other quasi-historical reenactments that encourage participation in communal re-creations of a consciously imagined and idealized past (Gunnels 2005). The limitation of all these interactive environments, however, is their carefully bounded extent in both space and time. Whether in visits to open air museums or historically themed events, participation is explicitly defined by the way they are set apart from everyday life. They require special acts of pilgrimage and expenditure; participants travel to and from them as consumers of momentary experience with a beginning and an end.

'Performative memory' as a component of collective experience and identity is something quite different. It is an ongoing process that is also at least potentially transformative. Each performance of inherited, shared traditions is not necessarily a discrete occasion, but often a fleeting moment in which, by tweaking the performance itself, the meaning or relevance of the memory itself can be changed. As suggested in the UNESCO definition of intangible cultural heritage mentioned above, it is additive, and conversational, and has no clear beginning or end. Such performances (and the conversations about them) can extend over months or decades; old threads dropped in the past can be picked up again when the need arises, or interest returns. These moments can be both serendipitous and purposeful. But in either case, the narratives constructed are not totalizing, absolute or singular. They do not resolve in a single answer. Rather, they are contemplative, experimental, evocative and essentially mundane. They occur in the almost unnoticed moments of changing the recipe inherited from mothers-in-law or first cousins; in retelling alternate versions of remembered events with a childhood friend; or walking home along a well-worn path for the first time with a new neighbor or a grandchild. There is no sense of separation from everyday life; in fact, it is just the opposite. These performances are the way that people weave rational connections between past and present, taking apart elements of the remembered past and reassembling them to make sense of an ongoing, dynamic present, and to negotiate the currents of power and authority that shape daily life (Scott 1990; Glassie 1995; Zerubavel 2004).

Yet in a world in which communities of memory are far-flung, hybrid and diasporic, and where face-to-face interaction between siblings, old schoolmates, former colleagues and childhood friends is increasingly replaced by the digital communication of email, websites and social networks, new kinds of 'virtual' communities are being built. It is our contention that digital technologies offer a new medium not only for conversation and contact, but also for the construction of viable, continuous 'memory communities' that creatively reassemble fragments from a shared past into a dynamic, reflective expression of contemporary identity.

The potential of these digital communities to restore a sense of collective memory is enormous, as we will suggest in the following sections. But the technologies that animate them must be used with caution, lest they merely enhance the dominance of the authorized, official narratives that have degraded and in many cases replaced the creative power of both individual and collective memory.

Realer than real: the seductive misuse of digital technologies

The amazingly lifelike images of new generation computer reconstructions of ancient sites, immersive environments and personalized content are powerful new elements in the presentation of official heritage. Through the first two decades of the twenty-first century, the development of digital applications has blossomed with funding from such major sources as the European Commission (Digicult, Minerva and EPOCH being among the most well-funded EU projects); the US National Park Service through its National Center for Preservation Technology and Training; heritage non-profits such as CyArk, Archives & Museum Informatics and the Virtual Heritage Network, and with increasing investment from a large number of private firms in the computer and museum design industry (cf. VAST, VSMM and Eurographics conferences). Digital applications have become standard features of archaeological and architectural research, public heritage presentation and even site management, with a new body of theory emerging for the most effective use of digital heritage for both research and educational uses (Parry 2005; Cameron and Kenderdine 2010). Even though concerns have been voiced about the durability of digital media (Addison 2007), it is taken as a given that digital heritage is essential for the preservation of the world's heritage. Yet what is its effect on performative collective memory?

Visualization is perhaps the most conspicuous of the new digital heritage applications, though it is hardly an innovation or novelty in the field of heritage (Molyneaux 1997). Ever since the birth of what might be called antiquarian interest in the Renaissance with their meticulous architectural reconstructions of Greek and Roman architecture through the melodramatic tableaux of the pageants and panoramas of the nineteenth century, to the Hollywood costume epics of the twentieth century, graphic imaginings of the past have always been a standard medium of popular historiography. As stirring or romantic artists' impressions, these pencil-drawn, oil-painted or cinemascoped Technicolor images have created indelible popular images of the past. Those images have been constantly changing over time, as artistic styles and contemporary tastes transformed the conventions and styles with which and by which antiquity was represented in graphic form, and cultural modalities of visual accuracy and authenticity evolved.

The rise of 3D computer modeling of ancient structures, sites and landscapes (Barceló et al. 2000) can be seen as a continuation of that long tradition. But it also marks a considerable rise, at least in some circles, in expectations for both passive consumption and its historiographical authority. The increasing sophistication of laser scanning and excavation database-driven reconstructions has tied the visualization of the heritage site or heritage object ever more closely to digital processes, seemingly based on empirical evidence alone. The increasingly sophisticated rendering has given rise to a style of pseudo-photographic representation that has unparalleled authority in a world of computer images and video games. In its increasing use as a standard feature of visitor centers, augmented reality kiosks, immersive environments and other interpretive installations for public presentation, the character of 3D modeling as realer than real has been 'enhanced' by a range of new applications that populate the reconstructed scenes with wholly artificial 'people' (Tecchia *et al.* 2002) and even fill the unexcavated or undocumented spaces with sophisticated applications (Willmott *et al.* 2001) to camouflage with pixels the inevitably fragmentary information we have about the past. As a result, the formerly tangible, experiential distinction between excavated site or surviving ruin and 'artist's reconstruction' blurs, or disappears altogether: the observer cannot tell the representations of empirical or phenomenological 'fact' from pixilated speculation.

The danger to public participation (of more than a purely passive kind) in the kinds of collective memory mentioned above is not only the increasing authority of 'expert' presentation; it is the isolating and highly individualizing way in which the past is perceived via these media. Although there is unquestionably a useful role in 3D documentation of endangered or destroyed cultural resources, the quest for ever greater visual realism and the increasing introduction of navigational rules, simulation protocols and participation in heritage activities in virtual worlds such as Second Life (Bogdanovych *et al.* 2011) substitute the stimulating experience of being in a life-like but virtual environment for possible reflection on the relationship between past and present, and the relationship with a meaningful memory community.

The past indeed becomes a 'foreign country' for most visitors to heritage sites a place of wonder and escape from the present that is static in its representational perfection, with none of the consequences, uncertainties or imperfections that both the past and our knowledge of it share (Lowenthal 1999). 'Digital heritage' or 'virtual heritage' holds the danger of becoming all visualization and factoids, delivered to individual viewers or receivers not only through the computer-generated images on fixed video screens and smartphones but also through the delivery of global positioning systems (GPS) heritage through handheld devices or standard mobile phones (Benini, et al. 2002; Ancona et al. 2007). That is not to say that digital visualization has no place in the gathering and analysis of data; our emphasis is, rather, on its danger as the increasingly common face of public heritage. For a public increasingly accustomed to the passive consumption of historical content, there is a dangerous illusionary aspect of which digital archaeologists, humanists and heritage professionals need to be aware. The examples cited above are highly individualized and isolating. In particular, there is nothing collective here, other than the sum of individual experiences. In most instances, individuals interact with software, not each other. The scripts for exploration and application are pre-set by scholars, museum curators or curriculum designers; there is little or no real option for the kind of conversational transformation that is so essential to the constant recreation 'by

communities and groups in response to their environment, their interaction with nature and their history, and provides them with a sense of identity and continuity' (UNESCO 2003, Art. 2.1).

Yet the digital technologies do, in fact, have a great potential to make interaction really potent; the continuous contribution of data from end-users (as well as scholars, curators and educators) not only makes the process of learning about and reflecting upon the past dynamic and unique to the place and community. It is a digital version of Raphael Samuel's 'theatres of memory' - places, events and opportunities where the community as a whole and the individuals within it can reflect on the past and create an evolving image of themselves (Samuel 1996). That evolution only occurs when people interact with each other. It is the ability to hear someone else's version of the story, or see a 'map' of someone else's memory of a place, that creates the open cognitive space in which you can change your own. This theater does not have to be simultaneous or synchronous; experiences can be layered over time as well, as when successive generations inherit and use places and spaces, rituals and habits. But the sense of collective engagement has to be present somehow, before digital versions of interaction can escape the old one-directional frame of the museum panel or the textbook chapter.

In the following sections we explore the potential for digital technologies (from early participatory geographic information systems (GIS) to social networking) to serve as tools for the reconstruction and constant reformulation of performative collective memories in the dimensions of space, community and individual identity.

Re-enchanting places: the collective memory of GIS

Place is a powerful theater for memory, both individual and collective. In recent years, participatory GIS projects have evolved from a field researcher's labor-saving strategy for data-gathering into genuine attempts to employ the technology as a place-based medium for both collective remembering and transformation. The Levuka Cultural Landscape Project is one such effort (Purser 2012). Levuka, Fiji, is a small island port community of about a thousand people with a rich and diverse history. It is currently being nominated to the World Heritage List by the Fijian government for its role as the British colonial capital of Fiji in the 1870s (Harrison 2004).

The Levuka Cultural Landscape Project grew out of the need to find some mechanism for enabling the local community to participate in the heritage nomination process. The goal was to design an accessible medium, or platform, for first documenting what community members wanted to have acknowledged as elements of the town's heritage, and then conveying that information to authorities from their own government as well as an array of international consultants, functionaries and decision makers. In this sense, the project was grounded in and driven by an existing, physical community. The digital technology became a very locally focused medium, or platform, first for discussing memories and meanings amongst themselves, and then for generating what became a truly alternative 'map' of what local Levuka community members defined as 'heritage', and its 'significance', in contrast to definitions being driven increasingly by outsiders.

Over the course of five field seasons in seven years, successive layers of information were imbedded in the GIS. Each season was designed around a series of open community workshops and meetings. Participants in these meetings worked on three things: reviewing the new images produced by previous season's work; developing the new information for that season, and deciding what kinds of information should be recorded next. Each successive season's maps were generated based on what the previous work revealed.

Over the years, it became very clear that while the end-product of the GIS, with all its detailed map data and comparative power, was very useful, it was the process of creating it that had the greatest impact for people in Levuka who took part in the workshops. More important than making the maps was deciding what should go on the maps, and why. More important than creating the document was the power to see what had been invisible made visible. Conversations sparked and crackled around how to draw boundaries, label neighborhoods with local names, chart the routes and pathways that carried daily foot-traffic, and tell the remembered (but often conflicting) stories about past uses for a house, a lot or a district. Prior to starting the project, all official attention on Levuka's 'heritage' had been focused on important public structures related to Fijian national history, and a picturesque and accessible commercial strip where a localized heritage tourism was already well developed. The GIS process expanded the physical scale of what might count as heritage into the residential neighborhoods and more remote enclaves well away from the civic and commercial sector. But it also created an inherently intangible and constantly evolving, yet instantly and immediately visual means of asserting that others also held an authority to define what counted.

In the process of remembering, things were also discovered. New ideas about the relationships between past and present emerged, and literally took shape on the map. Areas of town that had been perceived as occupied only by 'newcomers' were found to be vibrant enclaves of families and individuals with local roots going back four generations. Places socially perceived as 'outside' town were found to be within the official town boundary. And perhaps most importantly, people who thought their histories had been forgotten or ignored by the town's current residents not only got to perform their own memories, but discovered that others remembered as well (see Simon, this volume). Stories began to overlap like the digital layers of the GIS, palimpsests of place-based memories held by individuals, families, neighborhoods, all the town's church groups, alumni societies for the different schools, occupational clusters of storekeepers, government workers, schoolteachers and so on. Out of the rich interaction of these distinct but connected and overlapping 'memory communities' came an increasingly clear demand on the part of town residents to be given a greater voice in the next phases of the heritage nomination process.

In essence the ultimate product of the Levuka project may have been awareness and mobilization – not that there was none there before, but the generative process of the GIS development definitely supplemented and supported earlier efforts, giving them new impetus. Several years before the Levuka Cultural Landscape Project was begun, a consortium of local schoolteachers and community leaders had painstakingly collected a wide range of town family histories, carefully including as many as possible of the ethnically diverse groups represented in the town's population. They published these in a slim volume that constituted the townspeople's first response to the externally driven and monument-focused heritage nomination process.

Entitled Levuka: A Living Heritage, and authored by 'The People of Levuka' (2001), the book argued instead for a focus on the people themselves, and their generationslong collective and collaborative stewardship of this special place. The participatory GIS project did more than simply map that community engagement onto built space and form. It took the representational, but sequential, linear and ultimately finite performance of family histories and individual identity that had been captured in the book, and translated them into a dynamic and continuing conversation about how and why those diverse but shared histories connected local people to both the place and each other. And Levuka's residents, in turn, have used that conversation as the basis for asserting their role in defining the town's future.

Reconstructing community: the digital diaspora as home

There is perhaps no clearer case of the stubborn maintenance of the cultural heritage tradition and collective memory of a diasporic community than that of District Six in Cape Town, South Africa (Jeppie and Soudien 1990). The exiles from the racially mixed (and bulldozed) neighborhood – scattered to different places with the actual location torn down - retained precious intangible memories of a time and a place that survived only in that community's mind. After the fall of apartheid, and a greater freedom to talk not only about resistance, but deep cultural resistance to the racially segregated order, the District Six Museum was founded. The memories were organized and collected in a former church now serving as a local memory institution. Through the contributed user content of evocative artifacts (like the street signs collected and kept by one of the bulldozer operators) and through the medium of a large map of the streets and squares of the former district painted on the church's floor, former residents, their children and grandchildren taped their notes and memories of their lost homeland to create a collective imagining of life in District Six that expanded the more straightforwardly documented history (Julius 2007).

It is interesting how this larger vision of collective history envelops and gives meaning to a recent attempt to represent shared memories of District Six through 3D modeling (de Kadt et al. 2009). Here, like a similar case in the very different context of the destroyed and abandoned town of Rosewood, Florida (González-Tennant 2010), visualization becomes an aid to collective memory along with other mnemonic techniques (see http://www.virtualrosewood.com/, accessed 4 April 2011). What process of collaborative digital memory-making can supplement the painted lines and yellow Post-its on the floor of the District Six Museum or the stories told about Rosewood? In the absence of the physical landscape that gave rise to the memories, a virtual landscape constructed digitally from both empirical evidence and collected reminiscences can map the community of memory itself.

That community of memory can be displaced geographically from its place of origin as well as distanced across time. In recent studies of the 'Newfoundland diaspora' and people's cultural yearning to remain connected with the traditions and sites of Newfoundland through the creation of digital communities, we can see immigrant heritage not as a place or a product but an ongoing process in which digital technologies play an essential role (Hiller and Franz 2004). At first instrumental in helping the relocating migrants find jobs and accommodations in their new homelands, in this case in far western Canada, the Internet ultimately becomes a bearer of culture in later stages of diasporic existence, when the 'homeland diaspora' system has replaced the original idea of territory. Facilitated by the participation of the staff and membership of a cultural organization, the Internet is transformed from a source of practical information that facilitates the move to a source of cultural capital when the immigrants' identity begins to erode. Digital social networks maintain a sense of connection during the migration period, dealing mostly with contemporary family events and one-to-one communication. But as the bonds of the 'immigrant village' begin to fray and the natural process of assimilation occurs, the digital media become a source of deeper heritage information, as people attempt to maintain, and ultimately to construct entirely anew, the basis of a composite identity.

The key distinction made by Hiller and Franz is between new ties, old ties and the search for lost ties - and it is in this search that heritage as performative memory can be facilitated digitally. Case studies have shown that diasporic peoples as different as Trinidadians and South Asian Indians go through the same processes of community maintenance, cultural identity expression and information sharing that were simply not possible before social media. Where before the mechanisms that defined shared cultural heritage were territorially bounded or required physical presence, those connections can now be maintained digitally. As Hiller and Franz observe (2004: 747) 'instead of being an alien outsider in a strange land, the online community allows the migrant to belong and to be a member of a shared community'. And that feeling of being a member of a collective is what the appreciation of heritage, whether completely ancient or more modern, is presumably all about: the sense of a living, dynamic and useful cultural heritage that is, as we have repeatedly mentioned, 'constantly recreated by communities and groups in response to their environment, their interaction with nature and their history, and provides them with a sense of identity and continuity'.

Another intriguing case study is the diasporic use of digital heritage among overseas Chinese for sharing and interpreting traditional Chinese poetry (Chang 2006). In this application, the online activity is shifted 'from path finding and selection to the user's ability to create content and meaning' (Chang 2006: 174). The most common digital heritage applications, guided by (external) expert opinion, prevent the user from doing just that. Yet in the context of diasporic communities,

such meaning-making is a public act that expands or subtly transforms the collective memory of the wider community. This is a far cry from the use of digital technologies merely to reproduce and disseminate catalogues of expert information, which divert the power of the communicative medium from its potential to serve as a platform for performative collective memory.

Silvia Mejía Estévez notes a similarly instructive example of the use of Internet communications by new Ecuadorian immigrant communities in Spain (Estévez 2009), who are assisted by non-profit initiatives like the Programa Migración, Comunicación y Desarrollo to obtain digital access to their home communities. Estévez suggests that constant access to a virtual community encompassing both homeland and diaspora in a web of communication, content and shared culture - through websites, chatrooms, Skype links and emails - leaves neither time nor space for isolation or nostalgic longing. The digital tools (however simple and straightforward) help strengthen a sense of community belonging, by providing both the moments and the media for potentially transformative conversations about the character of membership in the community. These performative and self-reflective aspects of constantly evolving collective memory are at the heart of communitybased heritage.

As in the case of Fiji above, a collective consciousness linking past and present is maintained, but here it does so in places where the distances between members of the community are great. This collective process is something that standard heritage presentation of monuments and sites cannot offer, for in their static official nature they discourage rather than enhance cultural creativity. And what of the case when the process of even greater alienation has occurred and the search by individuals for their 'lost ties' must be conducted not only through space but also through time?

Genealogy as a social network: digital memory communities

The quest to restore 'lost ties' noted in the scattered Newfoundland digital communities, and the attempt to maintain cultural continuity through the use of the Internet by the Ecuadorian diaspora can be seen in yet another form in the new rituals of 'Highland Homecomings' described in detail by Paul Basu (2007). This is performative heritage in all its dimensions, creating processes of remembering (or experiencing a perceived sense of remembrance) that weave together national and ethnic narrative with place and personal experience. This produces what Basu calls 'an answering image' to an assimilated diasporic existence through the use of representations of the past and the social ties drawn from it. Here is diasporic heritage ritualized back in the 'homeland' wherever and however that homeland is perceived to be. In combining historical research with specific points on the Scottish landscape, the homecoming walks and visits create a community of memory with very concrete social implications, quite apart from the documentation of the tangible and intangible traditions. These connections and recollections are now both maintained on websites created by the Scottish National Trust and by innumerable contemporary 'clans'. The easiest part of the digital performance is in planning and

recording this nostalgic, identity-rich connection. But there is something else of great interest in the possibilities of digital technologies facilitating a physical return.

It is the idea of a diaspora being overcome by a new kind of digital genealogy that crosses the boundaries of both time and space. These are pilgrimages of intentional memory creation: the act of returning to physically stand on the street where a storied great-grandfather once walked is the literal embodiment of a generational connection between past and present. So by definition, these journeys create repeated moments of opportunity for exploring personal meanings of and for a shared diasporic past. Moreover, these moments are themselves often shared, creating in effect new memory communities with others in the tour group not even necessarily of one's own family, but on the collective pilgrimage themselves. The fundamental difference between the shared exploration of memory in place, and the shared purchase of an authoritatively guided tour at a conventional heritage site, is this active, collaborative conversion of experience into heritage.

Another use of digital technology to facilitate and document the collective memory of scattered or fragmented communities is in the realm of genealogy. As Tamara Hareven long ago noted, identity and consciousness are dependent on the depth of generational memory, and the quest to extend the reach of family connections has become an 'exercise of "tribal rites" in an advanced technological society' (Hareven 1978: 145). The kinds of fact-based public history (digital or analogue) in which individuals are informed of events and cultures far beyond living memory do not result in a meaningful connection between personal circumstances and collective history. It is therefore significant that genealogical activity has become for many, particularly in the United States and the United Kingdom, an increasingly popular activity that is for the most part quite unconnected with 'official' heritage. In the transformation of genealogy from a passively acquired record of a pedigree to reinforce elite social status or inheritance claims has been upended. It has been transformed from product (title, status, inherited property) to a process of individuals from many walks of life hoping to find out 'who they are' (cf. Mason 2008). In a sense, like the other cases we have mentioned, digital heritage can serve not merely as a purveyor of archaeological information or historical visualizations, but as a facilitator of reconnection - in this case, to history.

And here is the digital connection: the concerted effort by government bureaucracies, particularly in the industrialized world, to digitize their records has created an unparalleled abundance of raw material for personal genealogical connections – in the form of birth records, death certificates, census forms and tax rolls, increasingly accessible on the Internet. Private firms, the most well-known and largest being Ancestry.com (Saito-Chung 2011), have offered subscription-based access to their growing network of genealogical resources. Following the pattern set by the earlier BBC version of *Who Do You Think You Are?*, the search for roots by select celebrities that is sponsored by such firms during the US TV primetime (National Broadcasting Company 2011) shows all the advantages and drawbacks of other entertaining forms of digital heritage: passive consumption of packaged

narratives, in vivid visualized form. This is vicarious heritage with its generalized lessons for the public: how a starlet, sports hero or singer traced the unexpected twists and turns of his or her family's history.

The opportunity to participate in one's own quest to link his or her forebears to the sweep of official history certainly offers more of a process, but is it yet another isolating activity that works against the kinds of collective memory that are coming to be recognized as the dynamic and meaningful face of public heritage? An important step towards answering this question has been made by Labrador and Chilton (2009) in their examination of the restructuring of digital heritage databases - a suggestion with profound implications for all the other applications based on community engagement that we have surveyed in this paper. Recognizing that the basic structure of digital collections of data reproduces that of the traditional archive - constructed and selected by experts for passive consumption by other scholars or the general public, they ask pointedly, "What if non-"expert" heritage archive users were acknowledged as imaginative information seekers willing, able, and wanting to create their own meanings? And what if this meaning-making process was more formally accepted as part of a new archival process, the creation of a self-consciously created new memory palace?' (Labrador and Chilton 2009: 4).

In understanding that a shift to a truly user-oriented database approach would entail a fundamental shift in construction, they go on to propose a transformation from the collection and handling of huge amounts of data for research purposes to a construction that would make individual searches for specific items of information more accessible. Indeed the growth in the individual versus research uses of institutions like the US National Archives is indicative not only of a growing hunger to bridge the gap between individual identity and collective memory, it is an important factor in how the archives - and by extension digital databases that underlie the collections of museums, archives and archaeological data banks - will be reshaped in the decades to come. And that brings us back to the theme of digital genealogy where in a digital, interconnected world, the process of searching through the data is not necessarily a solitary one.

Digital technologies can create heritage networks that resemble real-time social networks like Facebook, except with the added dimension of historical time. Points of contact between separate searches lead to communication between seekers and new connections in both present and past. As Labrador and Chilton put it, 'Here the meaning-making process is socially mediated – the inherent contradictions between personal histories are not presented as public multiple narratives, but are encountered as moments of contact during contiguous heritage quests with multiple intersections of shared nodes' (2009:6). This is quite different from most currently conceived usergenerated content that is used to create museum exhibitions or digital repositories of multiple memories. It is light years distant from the digitization of expert-driven collections of objective (arti) facts. It represents a new means of creating social contact through heritage search and reflection - in other words, the facilitation or creation of digital memory communities.

Such social networking sites – along with other more spontaneous uses of social media create a virtual kitchen table, backyard fence, corner bar conversation that, because of the textual and visual format, are instantly accessible yet at the same time archived, preserving the structures of collective memory, even while the memories themselves evolve and change. This allows for contemplation, for coming back the next week with a new comment, or when a new set of photos goes up on someone's wall or when a new connection is found. And the community participating in the conversation can be expanded, but it is a community of active seekers, producers and preservers of cultural heritage information, not an essentialized and anonymous 'audience' for predigested heritage.

Conclusion

These examples from the United States, South America, Fiji, South Africa, Asia and Europe show that the creative value of digital heritage lies not only in information processing through instantaneous communication networks or databases of precise scientific documentation, but in its power to stimulate unique, community-based reflection on past, present and future identities. We have presented these examples of the potential of digital technologies as media of memory in a fragmented, amnesiac and diasporic world. It is clear that digital technologies and social media do indeed represent a new way for us to reflect upon the past. But they must not be allowed merely to intensify the power of old top-down structures.

The key is indeed to favor process over product in the cultural production of our relationship to the past. And it is through the communicative and connecting nature of social technology that new 'realms of belonging', in the words of Anne-Marie Fortier (1999) can be established, maintained and transformed in our fragmented and diasporic world. Digital technologies can help individuals, communities and communities—in—the—making escape the conventions of standard visualization and top—down heritage presentation, but they cannot do it alone. The 'software' for such a radical reversal in the process of heritage lies in the very fact that collective memory—now largely missing or highly regimented in our world of individualism and media conventions—is a prerequisite for productive social action and cohesive, dynamic communities.

Heritage has the potential to restrict or empower; its significance lies not in the objects and places of the past or their digitized documentation. As we have seen, digital technologies have the capacity to make the artificial and contemporary seem ancient; they have the power to make carefully scripted interactive games and simulation seem like the passage of historical time. But contingency, agency, surprise, contemplation, serendipity and, above all, creativity are the secret ingredients of the human-made past. It is in enhancing the scripting and performance of this rich cognitive software that the true value of social media lies. And that software is the ever-changing collective conversation about past and present – about space, identity and emerging selfhood – that constitutes the dynamic core of meaningful human memory.

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