Vernacular mappings

affect, virtuality, performance

PRS Upgrade Report

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// Abstract

Pandemic growth of participatory mapping groups and digital cartographic technologies poses significant questions for geographers interested in the generation of virtual spaces. This report outlines the rationale and design of doctoral research into new forms of participatory mapping, or what is termed here, 'vernacular mappings'. Arguing that geographers need to pay closer attention to vernacular mappings, particularly to Web 2.0 assemblages, the report establishes three core aims. Firstly, taking non-representational theory as its point of departure, the research traces the practices and performances implicated in vernacular mapping in order to generate a vocabulary that attends to the micro-politics of participatory mappers. Secondly, the research interrogates and animates the affective and virtual resonances underscoring the performances of vernacular mapping. Here, affects are located as relational bodily intensities following the philosophies of Benedict de Spinoza, Gilles Deleuze and Felix Guattari, whilst the virtual is conceived as the realm of potential, influenced by the work of Brian Massumi. Thirdly, the research investigates the social and political potential of vernacular mapping for reconfiguring cartographic practices and geographic imaginations, suggesting that popular forms of participatory cartographies, inspired by prolific virtual geovisualisations such as Google Earth have the capacity to alter perceptions of, and movements through space. Preceded by a synoptic literature review which works to re-invigorate the conceptual use of vernacular, the report synthesises an experimental methodology which takes seriously recent calls for a processual ethics and an empiricism which attends to performance, experience and affect. Specifically, three empirical sites are identified; firstly, an ethnography of OpenStreetMap, a wikibased participatory mapping organisation, secondly, a collaboration with the 3Cs Counter-Cartographies Collective at the University of North Carolina and thirdly, an investigation into how vernacular mappings have been co-opted into institutional knowledge generation, with a particular focus on Google Earth.

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// Introduction

Increasingly 'participatory' cartographic practices (Chambers, 2006) pose a salutary challenge to reified inscriptions of space as conjured by states and their attendant cartographic institutions. Facilitated to a large extent by the expansion of *Web 2.0* (a perceived second generation of the internet which augments user-intervention and cyber-collaboration), participatory and 'open-source' mapping groups such as the wiki-based *OpenStreetMap* have re-ignited people's enthusiasm for subaltern mappings, whether along pencil or digitalised lines (Perkins and Dodge, 2008). Despite their growing prevalence, geographers have been reticent to take such groups seriously; a situation rendered all the more puzzling owing to the discipline's subject matter in which the map is a faithful motif. Geographers risk therefore becoming marginalised from shifts toward increasingly 'volunteered' cartographies; performances which impact upon geo-visualisations/imaginations and moreover, how people move in the world, how people sense in, or through space, not to mention how people/non-humans/things *participate* in mapping and mapped knowledge.

That said, there are tentative motions in geography to re-work its cartographic heritage in ways that wrestle mappings away from representational analysis, in which maps are forms of earth-writing attached to a hegemonic authority, to approaches which attend to non-representational registers of thinking (Crampton and Krygier, 2006; Kitchin and Dodge, 2007). Specifically, following Thrift (2007), this has meant a rejection of geometric cartographies; "a world where all possible 'surprises' have been pre-codified" (Rabasa, 1994: 194). Geographers working through non-representational analyses have sought instead to rupture the ontological security of mapping in conceiving maps not as stable, static fixations of meaning, but instead as fleeting and relational, their work never fully done (Kitchin and Dodge, 2007). These non-representational approaches are indebted to previous critical-cartographic works which began to unsettle the cartographic terrain, notably the deconstructionist efforts of J.B Harley (1989; 2001), the semiotic map-readings by Denis Wood and John Fels (1992; 2008), the conspiratorial revelations by Mark Monmonier (1996) and John Pickle's influential Foucauldian interrogation of Geographic Information Systems (GIS), (1995; 2006). Moreover, non-representational approaches also incorporate Deleuze and Guattari's (1989) experimental cartographies as practices of imaging relations between affective forces (Coonfield, 2007). Mapping here is less about tracing states of affairs and instead is concerned more with witnessing performances which generate maps; open and connectable in their dimensions and susceptible to constant modification (Deleuze and Guattari, 1989).

Taking as its point of departure these non-representational approaches, the research interrogates the myriad social, micro-political potentials, of emergent mappings; constituted by performances which resist a univocal totalising vision (Bruno, 2002). The research has three broad propositions, summarised as follows.

1 // Vernacular as co-produced

Firstly, the proliferation of participatory mapping groups such as *OpenStreetMap* warrants a new vocabulary under the rubric of *vernacular mappings*. Vernacular here does not connote a regionalised idiom, but rather attends to, following Whatmore et al (2003), notions of conviviality and co-production and also, after Stengers, mapping into knowledge (Whatmore, 2003). Explicitly, the research contends that emergent mapping groups are not reducible to the caricature of angstridden, counter-hegemonic assemblies. Instead, the research demonstrates that vernacular mappings constitute a serious assemblage of performances, processes and humans/non-humans which are set to fundamentally change cartographic practices. These performances, as Deleuze and Guattari suggest, constitute a micro-politics; not a politics of resistance, but a quotidian politics; space-times of, and for, the everyday.

2 // Affect and the virtual

Secondly, working through non-representational theory, the research acknowledges well-rehearsed critiques of cartographic reason (Olsson, 2007), but proposes also to trace the *affective* and *virtual* resonances underscoring vernacular mappings. Following Deleuze and Guattari (1989), Massumi (2002), McCormack (2003) and Ingold (2007), the research analyses the infusion of affect through the performances of mapping. Affect here draws on Spinoza's concept, *affectus*, what Brian Massumi (2002) calls the pre-personal quality of intensity, the "in-between fields of interaction" (Barnett, 2008: 188), the capacity of bodies (human and non-human) to affect and be affected. Simultaneously diaphanous and hard hitting (Lorimer, 2008), affects are visceral intensities, not reducible to emotions nor necessarily allied to contemplative thought; if cognition is dwelling, then affect would be walking. Following Serres (1991), affect is the sense in space before the sense that signifies – a contention with particular significance for mapping insofar as to question how affect is incorporated, and generated, by cartographic performances. Affect then has a double location for enquiry; firstly, how is affect imbued in the performances of vernacular mappings and secondly, how do these mappings affect imaginative-or-otherwise geographies?

Consideration of affect necessitates an investigation of the virtual. The work of Brian Massumi in particular provokes alternative definitions to intuitive understanding of the virtual, which in this context, is, "the pressing crowd of incipiencies and tendencies...a realm of potential" (Massumi, 2002: 30). McCormack (2009: 118), in differentiating between imaginative, digital and temporal virtualities, suggests the latter is, "that which is real, without being actual". Moreover, like affect, the virtual is doubly located in this project. Firstly, the research will be immersed in the digital virtual, in content and methodology; participatory mapping groups such as *OpenStreetMap* generate both real-yet-not-actual (web-based) and also real-and-actual communities. Secondly, the virtual has significance in investigating the potentials engendered by vernacular mappings — potential space-times and communities. Potential is exemplified by the way in which virtual globes such as Google Earth digitally unfold; pointing to both a digital virtuality and a temporal virtuality; — a picture of the past/present/future, without arriving there completely; cartographic abstractions not necessarily contradictory to lived experience.

3 // Vernacular co-opted

Thirdly, the research will investigate the social, technological and micro-political pertinence of vernacular mappings. Specifically, can vernacular mappings contribute to efforts to develop more participatory cartographies/GIS and which resist subsumption by corporate or state-sponsored mappings? Where vernacular mappings are co-opted into institutional/business practices and knowledge generation, for example in the case of *Google Earth*, the research will investigate how the performances involved in vernacular mapping are appropriated by cartographic businesses and their attendant modes of (spatial) knowledge production.

// Next steps

The following section engages with recent literatures animating an increasing interest in critical cartography and non-representational approaches, whilst introducing the conceptual foundations of 'vernacular mapping'. A range of experimental methodologies is then sketched, outlining three empirical 'sites' which attend to the three research propositions. To surmise, whilst maps are obviously important, there is more at stake here than just the way people *see* the world. As Wood and Fels (2008: 195) suggest, "map study suffers when it is restricted to maps".

// Introducing vernacular mappings: a literature review

"There's a self-indulgence in telling others what you've read and drawing lines between it and what you propose to do that sets our teeth on edge" (Wood and Fels, 2008: 218).

// Following loose-ends

Massey (2005) suggests that cartography struggles to cope with loose-ends and ongoing stories. Moreover, perceived as representational devices and processes, maps and map-making seemingly hijack the process of *becoming* (Cresswell, 2006), whereby movement and process are rendered static and individuated. It would follow then, that mappings and cartographies are antithetical to non-representational approaches. However, recent theoretical steps and tangible shifts in cartographic performances complicate deconstructionist critiques of maps. What follows is not an echo of increasingly well-articulated critical cartographic discourse (see Del Casino and Hanna, 2006; Harris and Harrower, 2006; Crampton and Krygier 2006; Kitchin and Dodge, 2007), but instead is an evaluation of why ontological shifts in mapping theory are important, particularly in mobilising a conception of 'vernacular mapping' which runs along and through lines of affect.

Positing maps as emergent, processual, relational and fleeting (Kitchin and Dodge, 2007), whilst an axiom not exclusive to non-representational theorists (see Pickles, 1995), demonstrates a significant epistemological break from accounts which uphold maps as ontologically secure, static, fixed both in meaning and in space-time (see Robinson, 1979; Robinson and Petchenik, 1976)). Going beyond the deconstructionist heuristic, following J.B. Harley's seminal works (Harley, 1989) which identifies a core-focus of power within the map, relational approaches point to the diffuse and distributed vectors of power(s) which run between the map, mapper and everything-else-in-between.

I suggest that there are three reasons as to why recent non-representational reformulation of mapping theories are important. Firstly, together with acknowledging the broader *cultural turn* in geography, relational mapping discourses which apprehend the *becomings* of maps are more closely attuned to the concomitant emergence of participatory mapping organisations and individuals such as *OpenStreetMap* whose practices are explicitly bodily (or whose bodies are more visible) and whose reasons for being are far from axiomatic.

Secondly, non-representational approaches to mapping temper attempts to deconstruct images and forge fixed, allegorical meanings, replacing one set of opaque 'truths' with another. To paraphrase Derrida (1996), deconstructionism, by virtue of its motivation, cannot escape itself. Instead, witnessing the relational emergence of mapping enables the tracing of lines, practices and movements of various actants, non-human and human, working through the map. Instead of plots, grids and pre-figured legends, attention can be turned to the open-ended pathways and ruptures in the mapping performances. Following Deleuze and Guattari's (1989) rhizomatic cartographies, mapping becomes not the discovery of 'things out there', but instead becomes a fostering of experimentation.

Thirdly, non-representational approaches offer an alternative outlook for participatory mapping after more than a decade of academic derision aimed at GIS and corporate cartography. To be sure, the majority of critiques levelled against GIS (which precede non-representational accounts) are well-founded, particularly those which railed against the unbridled enthusiasm for such technologies, for example, Openshaw (1991) in which the author foresees GIS as the reconciler of human and physical geography. Similar claims were dealt short-shrift by the likes of Smith (1992) who identified the militaristic impulses of GIS and Pickles (1995) exposition of the deductivepositivism at play in GIS and remote-sensing discourse/practice. Many GIS programmes are now available free on the internet, some more powerful than their costly predecessors. Nonrepresentational approaches are therefore essential in interrogating the creation of virtual spaces; an interrogation not solely concerned with the creation of digital Foucauldian panapticons and macro-political preoccupation with surveillance and access, but also with a re-aligned virtual, the realm of potential. Here, vernacular mappings might entail a different kind of Public Participation GIS (PPGIS), not one predicated necessarily on Cartesian terms, but a mapping which works through bodies as sensors, and one which traces the bodily movements of humans and non-humans. This is not a PPGIS which has to be, by conviction, 'counter-mapping', as per the field examples of Peluso (1995) and Hodgson and Schroeder (1992), but can instead work on a micro-political register which realises more fully the 'public' and 'participation' in PPGIS (Wood, 2005).

// Vernacular re-worked

Vernacular mappings emerge from a re-negotiation of the term 'vernacular' which steers away from a parochial and pejorative array of connotations but which edges closer to a prehension of the vernacular as an open-ended set of lively, bodily and co-produced performances. In animating the

vernacular, this review explores how the vernacular has been deployed in linguistics and how the concept has been deployed in geography, emphasising recent literature that re-works the vernacular as a politics of co-production or co-fabrication. Freighted with the examples of participatory mapping projects, *OpenStreetMap* and *Greenmap*, the review suggests that the hybrid practices and performances of similar organisations highlight the intrinsically vernacular nature and output of these emergent open-source cartographies; explicitly, that whilst their practices rely on particular idioms and literacies, they are based on co-performances and that their outputs (knowledges, materials, waste) are co-produced – with actants not exclusively human.

Tracing its historical use elicits a narrow definition of the vernacular. Jackson (1984: 85) surmises, "as generally used, the word [vernacular] suggests something countrified, homemade, traditional". So far, so prosaic. Yet the danger of the vernacular conceived in this way is how the term might then be deployed. Jackson continues, "The...tendency to associate the word vernacular with a local form of speech and a local form of art and decoration entitles us to use the word to describe other aspects of local culture" (Jackson, 1984: 149). Snow (2007), analysing linguistic changes in Panama, compounds the perceived vernacular-equals-local constitution, claiming that a vernacular shift is a movement away from the traditional and local, but instead is a welcoming of the "modern, imported" and "metropolitan". Is this to imply that the modern and the metropolitan do not have vernaculars of their own? Is the vernacular always rooted to the local or regional? Such a conception is similarly pervasive in geography with numerous case-studies rendering spatial descriptions of the vernacular. Lamme and Oldakowski (2007), for example, set about identifying overtly stereotypical "vernacular regions" in Florida; "Bible Belt", "Dixie", "Sunbelt" — labels fabricated for ease of lexical representation, rather than for the witnessing of everyday vernaculars invoked by the residents of Florida.

Lane et al (2008) present a pro-active platform for vernacular, specifically in understanding the role of vernacular heritage in mediating environmental policy in the Murray-Darling basin, Australia, stating that the vernacular is particular and lived, not general and abstract. Whilst here the vernacular is lively and performed, there remains a tendency to grasp the vernacular as the preserve of the local, particularly in reverence to a perceived hegemony. Howard (2008) concludes that an intuitive but misplaced conception of the vernacular identifies three crucial strains; firstly, that the vernacular co-exists with a dominant culture; secondly, that the vernacular is subaltern, a source of resistant discursive power; thirdly, that the vernacular is a community of shared goals identified by its alterity to institutional knowledge. Common-sense beliefs of the vernacular they might be, but all

of which risk the essentialisation of various actants, and all which make vacuous the potential of vernacular as something co-produced.

To conceive of a vernacular which moves with the world is to interrogate the etymology of the term beyond its first cut as, "that which writes, uses or speaks the native, indigenous, language of a country or district" (OED, 2008). In brief, there are three potential facets to a re-worked vernacular. Firstly, the vernacular as, indeed, a set of particular phrases, idioms, signals and literacies. Secondly, the vernacular as the mundane, that which is quotidian and functional. Thirdly, the vernacular as co-production of knowledges, materials and 'things'. Vernacular mapping, too, is not new, particularly in the Far East where, as Yonemoto (2000: 647) states, "maps did more than convey information; they cultivated spatial sensibilities". Whatever interpretation of vernacular elected, it should caution against its narrowest definition, if only to avoid being held captive by a term whose very origins from the Latin *verna*, translates as 'slave'. Investigating participatory mapping is one way in which the cofabrication of a re-worked vernacular can be animated.

Stangl (2008: 245) remarks that, "the vernacular provides spatial forms for routines of everyday life". Participatory mapping groups such as *OpenStreetMap (OSM)* run along and evoke the routines of day-to-day movements. Founded in July 2004, *OpenStreetMap* defies facile categorisation as an institution, non-governmental organisation or pressure group. At its core is a global collective of *amateur* mappers who using handheld GPS devices and open-source wiki-style software, map (and generate) spaces. Even labelling *OSM* as a 'collective' is overstating the case, such are its diffuse and networked characteristics. Whilst the mappers are plugged into to a hybrid assemblage of satellites, relay-circuits, fibre-optic cables and concrete, the bodily performances which 'do' the sensing are seemingly (and literally) pedestrian; walking, pointing, pressing, sketching, discussing, sometimes over a pint after the day's mapping has been done. The 'output' of *OSM* is arguably no-less significant than that of cartographic behemoths such as Ordnance Survey and may in time even surpass the relevance of such institutions, but it is the vernacular character and practices of *OSM* which distinguish it from its corporate counterparts.

Participatory mapping and particularly projects which rely on *Web 2.0* and other free-open-source software (FOSS) packages enshrine particular idioms and literacies; another facet of the vernacular, but not one automatically relegated to the parochial. *OSM* relies heavily on internet platforms and vernacular languages and codes, few of which are intelligible without training. As Hauser (2007: 338) contends, "Internet exchanges are relatively uncensored, informal vernacular communications that,

when brought into the political realm, become a major source of mediated communication that locates power to influence outside official and elite power". For *OSM*, deploying layers of web-pages helps elide the cartographic licensing regulations enforced by amongst others, the UK government. It differs too, from traditional GIS, in that the motivations and methods of *OSM* are not commercially aligned, although that is not to argue that there are not issues of technical literacy and access which need to be addressed. For another open-source mapping group, *Greenmap*, the internet, where accessible, can assist mappers outline the lines of environmental issues and controversies, amplifying their contentions on a trans-local level (Gerlach, 2008; unpublished). As those who use *Greenmap* buy into a universal vernacular template of codes, icons and discourses, a sense of vernacular can be retained that holds on to its particularism, its idioms, its peculiarities whilst simultaneously apprehending a vernacular which can be enacted at any spatial scale, namely morethan-local.

Critical to this re-working of the vernacular is the recognition of the co-production at the core of vernacular mappings. Moreover, to understand co-production is to overcome the contention of vernacular as necessarily non-institutional. Participatory mapping groups are not easily cajoled into distinct categories; they are neither institutions nor non-institutions. Howard (2008) remarks pointedly that the durable division cleaved between the 'vernacular' and the 'institutional' has probably never really existed. Instead, in attending to co-produced online texts, knowledges and maps, Howard demands that researchers consider the complex interdependence of the vernacular and the institutional. *OSM* and *Greenmap* seemingly traverse the vernacular and the institutional to such an extent that it might become necessary to hybridise the two supposed separate 'realms'.

To illustrate, it is worth revisiting *Greenmap*. The maps produced travel a long distance and often in rhizomatic directions before *official* publication. The mappings are performed and produced by humans/things at, for the sake of argument, a local scale. Vernacular codes and movements abound. The things/humans mapped are those which have relational interest to the mappers. After all the walking, the pacing, the drawing, the erasing, the arguments about what to include/omit, the unwieldy mass of sketch maps travel by mail (still), plane, boat, transit van and increasingly twisted fibre-optic cables to a small office in downtown New York (let's call Greenmap's HQ 'The Institution' for now). The Institution edit the sketch maps, make recommendations and ensure that the mappers on the ground are using the prescribed terminologies and icons, before returning the maps to wherever they came from for improvement. This could all be construed a little too corporate to be considered vernacular, but the subtle negotiations that intersperse the mapping process complicate

what is institutional and what is not. Instead, mappers adopting the *Greenmap* system are co-opting an institutional discourse as part of the vernacular mix of participatory mapping performances. It is a co-production of cartographies; from the localised performances of mapping the site of concern, to the internationalised flows of paper and negotiations from institutions to not-quite-institutions. The significance of vernacular mappers able to incorporate institutional discourses is that such projects can switch between different nodes on the web and can frustrate any single authority that might attempt to exert control over a specific network location.

Cartography, therefore, can be reconceived through a performative conception of vernacular mappings, an embodiment of the mundane (through equally mundane bodily performances), a set of idioms and an avowed sense and practice of co-production, akin to Whatmore et al's (2003) 'politics of conviviality', a co-fabrication of cartographies expressing the potential of the vernacular — as open-ended and beyond representation. As Whatmore et al (2003) define 'vernacular ecologies' as "space times of everyday life co-fabricated between human and nonhuman practices and pathways" so too are vernacular mappings the cartographies of everyday life which, through cosmopolitical performances, can generate mappings which edge closer to moving with the world. Vernacular needs to be re-worked in such a way that it retains its intuitive meaning of particularism, but moreover, in a manner that attends to the enacted, hybrid and multifarious co-productions it engenders, extending political recognition to more-than-human company (Whatmore and Hinchliffe, forthcoming). Consequently, vernacular mapping goes some way to apprehending the emerging trend of virtual cartographies.

// Research Questions

This necessarily brief discussion of vernacular mappings foregrounds what will become a substantive literature review chapter which will address the infusion of affect and the virtual. To conclude, three key research questions follow from this review;

- 1. What are the performances, practices, cultures and motivations of participatory mapping groups such as *OpenStreetMap*? How do they differ from the cartographic practices, imaginations and epistemologies of antecedent GIS technologies and institutional cartographies?
- 2. How do the affective and virtual registers of 'vernacular mapping' help to understand these forms of map-mapping both in terms of web-based cartographic practices and societal geographic imaginations?
- 3. What are the social, technical and political consequences of vernacular mappings in terms of their potential to engender spaces for micro-political action? Can they, for example, contribute to efforts to develop more public-participation GIS (PPGIS) or resist co-option by corporate cartographies?

By addressing these questions, the thesis will evaluate the contributions of vernacular mapping to critical-cartographic discourse in academic geography.

// Speculative topographies; methodologies

"Performative, non-representational and affect-based research pauses on the frightening thought: nothing else ever" (Dewsbury, forthcoming).

Having positioned vernacular mappings as co-performances, the methodological interventions of this research will be similarly collaborative. Energised by geography's increased "sense of playfulness and a spirit of optimism and experimentation" (Popke, 2009: 81) the proposed research recognises the need for a broad repertoire of methodologies (Suchan and Brewer, 2000). The aim is to multiply efforts in geography to narrow the gap between theoretical ambition and methodology by accentuating the performative (Latham, 2003). Moreover, the research will contribute to the increasingly vociferous conversations amongst geographers regarding the status and practice of ethics, taking seriously the non-representational challenge posed by the quandary of how to generate *re*-presentations without representing (Laurier and Philo, 2006). The purpose of this section is to outline a visual and digital ethnography, an eclectic range of performances and interventions which travel towards a radical (James, 2003) or 'wilder' (Dewsbury, 2003) empiricism.

In brief, the research is based on **three empirical sites**, incorporating a range of methodological interventions. Taken together, the proposed methods will generate the materials needed to speak to the ambitions (and audiences) of this project. The **first site** is a multi-sited ethnography of *OpenStreetMap*, the **second site** is working on projects with the 3Cs – Counter Cartographies Collective and the **third site** will investigate how companies and institutions such as *Google* are coopting vernacular mappings into their own knowledge-generation. Maintaining serendipitous encounters as important sites of fieldwork (Pink, 2007), what emerges from these methodologies is a "disciplined lack of clarity" (Law, 2004: 6). Table 1 (page 16) summarises the research interventions. (See also Appendix 1 for research project schedule).

Site # 1 // Becoming mapper

The first, and most important, intervention for this research is the visual and digital ethnography. In this instance, the ethnography entails becoming a mapper, joining various *OpenStreetMap* collectives in the UK and Europe, learning how to use the various GPS devices and how to negotiate the slew of codes and idioms (computational and otherwise). The diffuse and distributed

characteristics of OpenStreetMap projects necessitate a nomadic fieldwork. Inspired by Bissell's (2009) 'go-along' methodology, the fieldwork involves participation in, and recording various 'mapping parties' (usually weekends of mapping in the daytime and socialising/talking-maps in the evening). Taking the lead from Richardson (2004), Lorimer (2007) and Pink (2007), visual technologies will be the foundation to the research insofar as they will be needed to trace performances and to animate affect in ways sometimes rendered impossible through logo-centric communication. Adhering to the totem of co-production, rather than doing the filming and photography myself, I will hand the camera(s) over to fellow mappers where possible; this has much to do with the ethical implications of this project as it does with common-sense; others will see/feel things that I will miss. In addition, I have established a weblog (blog) to post emerging sections of the research for comment and to facilitate a forum for vernacular mappings. In itself the blog is a curious intervention into the way Web 2.0 infiltrates research, or rather how research impacts on Web 2.0. In sum, the ethnography aims to document the cultures and practices of participatory groupings and to trace, firstly, the importance of co-production to vernacular mappings and secondly, to trace the affective and virtual performances engendered in such participatory groupings. Crucially, how do these mappings, these bodily performances engender different perceptions of, and movements through/in space?

Site # 2 // 3Cs Counter Cartographies Collective

The second intervention will involve collaborating with 3Cs, Counter Cartographies Collective at the University of North Carolina, Chapel Hill. A self-styled 'affinity group', 3Cs is a broad collective of academics, artists and communities which, part-inspired by Deleuzian cartographies posits amongst its aims to "render new images and practices of economies and social relations...to construct new imaginaries of collective struggle and alternative worlds" (3Cs, 2009). Clearly a more explicitly political ambition is at stake here, but working on various projects with 3Cs will elucidate a more expansive perspective on what vernacular cartographies are currently being mobilised and why (and how) mappings are re-entering people's day-to-day performances. Moreover, working with 3Cs provides an opportunity to apprehend interdisciplinary interest in all things cartographic and how mapping can be generative of things, spaces, affects, materials and performances rather than merely being an analytical science.

Site #3 // Vernacular incorporated

The third intervention will investigate how vernacular mappings are being co-opted into institutional and business-led projects, for example, how Google Earth deploy participatory mapping groups to collate spatial information and images for uploading on to their exponentially increasing suite of virtual globes. This will be done using techniques more familiar to geographers who feel that nonrepresentational approaches sit uneasily with long-held normative principles, particularly in critical geography. As such, interviews with company officials and participant observation with mapping project members will supplement the ethnography and 3Cs collaboration. The third intervention is important because geo-visualisations such as Google Earth are pervading day-to-day itineraries and moreover, in a seemingly innocuous manner. The research is therefore interested in how geographic imaginations are conjured by applications such a Google Earth and indeed, how different mapping performances translate into different ways of perceiving and moving in the world. Moreover, the research will interrogate how similar technologies are deployed by vernacular mappers in order to investigate what literacies, expertise and materials are needed to enrol into the participatory mapping community. In sum, does cartography remain, as remarked by Harley (1989), a "science of princes" or has it shifted to something more akin to a science of the 'masses', or at least to a technology of the community and the everyday?

// site	(/location	//timescales	//intervention(s)	//data generation methodologies	// materials generated	// data ana ysis methodologies
# 1 Becoming Mapper	Multi-sted, OpeaStreetMap projects primarily UK based.	6 – 9 months. Hery Term 2010 – September 2010.	Re-working cartographic vocabularies. Vernacular mappings as co-produced. Witnessing affect and the virtual Social implications // cartography from 'sziene of princes' to 'sziene of the masses?' Reconfiguring 'Public Participation' (615?)	visual ethnography. Collaborative web-log (blog). Filming mapping performances. Diagramming. Go-along interviews.	Films/photos. Photos. Notes. Dianies. Web-spaces. Maps.	Narration. Sloryboards. Diary entiries. You-Tube films. Photo-journals. Essays.
#2 30 Collaboration	University of North Carolina, Chapabirdi, USA.	3 monfirs. Michaelmas Term 2000.	Mirro-publical cartographies. Deleurian mappings. Interfeciplinary cartographies. Community-led socialaction.	Observant-parlitipation. Drawing. Community seminars.	Conversations. More maps. More notes.	Notes annotes (c.f. droubting reference following Latrux, 1999). Mapsuperimposed on map (c.f. Theft, 2007).
#3 Vernacular Incorporated	Mulii-sted Regional Google offices, incluing London.	Orgaing throughout project.	Incorporation of vernacular mappings into business knowledges. Popular geographic magnetions.	Interviews. Audio-recordings. Partiapant observation.	Transcripts. Digital audio files.	Transcribing.

// Ethics and performing the material

"Spinoza doesn't make up morality, for a very simple reason: he never asks what we must do, he always asks what we are capable of, what's in our power" (Deleuze, 1978: 9).

Notwithstanding recent criticism of institutionalised ethics by research council (Dyer and Demeritt, 2009), McCormack (2003) demonstrates how the pre-codification of ethics interferes with the potential to attend to the geographical event and moreover, its affective and sensuous dimensions. If this research is about generating affects through mapping, it follows then to avoid obstructing the potentiality of an event through excessive moralising and instead attempt to, following Coleman (2008) and Bergson (1992), to foster an intimacy and intuition, specifically, to coincide with the uniqueness of becoming. Such ethical positioning impinges on both the conduct and subsequent presentation of the research. In terms of conduct, there is a self-evident need to "cultivate good judgement" (Thrift, 2003), and by the same token, the narration of the research event(s) to the audience has to be taken seriously. The research will build on recent efforts to incorporate playfulness and experimentation in writing, found in the likes of offbeat situationist cartographic narrations (C.Cred, 2007), novels (Alexander, 2007) and experimenting with the rhythm of the text (McCormack, 2004). Deploying the internet as a field site also offers a range of performative and coproductive spaces; taken seriously, its digital geography of binary codes, fibre optic cables and it's not-so-digital geography of users can be approached in the same way geographers approach a more analogue ethnography. That said, the way research is conducted on the internet needs further investigation itself, particularly in the way things move and interact (Cora Garcia et al, 2009) and how research/researchers/things might be 'teleported' (Fields and Kafai, 2009); certainly my own first foray into blogging on OpenStreetMap was quickly chastised by several fellow users for posting an entry in the wrong thread. Small matters of net-etiquette perhaps, but crucial moments of research reflection nonetheless.

// Making sense of sensation

Endless notes, reams (or rather bytes) of film, countless maps, hour after hour of voice recordings, resonances of affective intensities – what to do with it all? Experiment with them might be the first injunction – using the "portfolio of ethnographic 'exposures'" (Dewsbury, forthcoming) as provocations for thinking. What then, do I want to think, do I want to say? Again, Dewsbury is mindful that directly signifying the past is not possible and so there is a need to be 'cute' with the

research stories that will be told. What research stories, then, do I want to tell? Following Massumi (2002), they should be stories that can stretch before, after and during the research event, stories which animate, however partially, the performances of maps and mappers. This is a determined attempt to enliven the generation and presentation of research materials. The process might, for example, involve filming a mapping expedition, taking notes on the way, recording conversations (at varying levels of formality) and penning a diary-entry later in the day. There is a degree of autoethnography involved, but co-fabrication is central; filming with others, learning to be affected through the mapping blog and learning to 'fail better'. This is a project to analyse the micro-politics and socialised cultures of participatory mapping groups and an apprehension of why people become involved. The materials generated will require close reading, re-reading, reading-onto-me, listening, watching and sensing. Short films can be posted on YouTube for comment, videos can be embedded into powerpoint presentations for mapping conferences and for the thesis itself, films can be reanimated through story boards in the text. If cartographic affects and events cannot be directly transposed from field to thesis, then employing videos and written narratives will generate different intensities and evoke virtual resonances – deliberately open-ended and predicated on uncertainty (Latour, 2005).

// Summary

This report inheres a 'speculative topography' (Thrift, 2007), outlining three core research objectives allied with three empirical sites. Informed by non-representational thinking, the research calls for a cartographic vocabulary which takes seriously the potential of the vernacular, affect and the virtual. A visual-ethnography is then diagrammed. Through internalising the technologies and performances used by vernacular mappings into the methodology itself, the research will trace and animate the affective energies and encounters which infuse maps, mappers and mappings and moreover, to ask what social and micro-political consequences emanate. Vernacular mappings warrant attention because participatory and cyber-cartographies are set to change perceptions of and movements through space to the extent that the Cartesian settlement of geometric lines and grids might yet falter a little more, generating spaces for micro-political action, but at the same time, providing another opportunity for appropriation by corporate cartography.

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// Appendix 1. Research Project Schedule