

The definitive version of this article is published by Sage as:  
Woodward, R. From Military Geography to militarism's geographies: disciplinary engagements with the geographies of militarism and military activities. *Progress in Human Geography* 2005, 29(6), 718-740.  
<http://phg.sagepub.com/cgi/content/abstract/29/6/718>

**From Military Geography to militarism's geographies: disciplinary engagements with the geographies of militarism and military activities.**

Dr Rachel Woodward

Contact details:

School of Geography, Politics and Sociology, University of Newcastle

Email: [r.e.woodward@ncl.ac.uk](mailto:r.e.woodward@ncl.ac.uk)

Tel: 0191 222 8354

Fax: 0191 222 6720

Forthcoming in: *Progress in Human Geography*, (2005), Vol. 29, Issue 6, page numbers t.b.c.

**Keywords:** militarism, military geography, military geographies, militarisation, defence, armed forces, war, armed conflict.

### **Abstract**

This paper reviews contemporary approaches in Anglophone human geography to the geographical constitution and expression of militarism and military activities. Three main approaches are identified, and the merits, limitations and insights of each discussed. These are: traditional Military Geography, intimately associated with state military discourses of military power; a broad political geography, focused on the spatiality of armed conflict; and research from across the social sciences on the political economies and socio-cultural geographies of militarism, particularly in non-conflict situations. The paper concludes with some suggestions for further empirical and theoretical inquiry, and argues on moral grounds for a human geography explicitly concerned with military geographies in all their forms.

## I Introduction: The Silent Cannon

Let me start with two initial observations about military geographies, the first personal and the second scholarly. I live in a house on the side of a hill. From the top floor of this house I can see for many miles in most directions. From this vantage point, the geographies of militarism and military activities are visible everywhere I look. I can see the lines of now-redundant defensive barriers and fortifications. I can see an armaments factory, and factories which function as links the supply chains for the arms industry. I can see places where I know military command posts exist, and places where I know they lie hidden underground. When the skies are very clear, I can see the radomes of a military communications station to the north. I can identify the location of a major army field training centre, even though from this angle I cannot see into it. I know that hidden from my view, behind houses and trees, are countless war memorials, an Armed Forces Careers Office, at least three barracks (two regular Army, one Territorial Army), and a naval station. If I look on the right day, at the right time, I can see military convoys trundling up the motorway which links the region to the rest of the country to the north and south. I can see military marks on every part of the view. Yet I don't live in a current or recent battle-zone, or in a territory occupied by a military force. I don't live in a garrison town or a military base. I live in a residential suburb of Gateshead in the north of England. Even in otherwise unremarkable places, military geographies are everywhere. But often you have to know where to look.

Military geographies may be everywhere, but they are often subtle, hidden, concealed, or unidentified. And so it is with their study. As others have observed, militarism and its effects are under-researched in contemporary Anglophone<sup>1</sup> human geography (and in urban studies and sociology too), relative to the significance of both militarism and military activities in shaping contemporary times and spaces (Shaw, 1991; Ó Tuathail, 1996; Dandeker, 2000; Dalby, 2001; Hewitt, 2001; Graham, 2004a).<sup>2</sup> This observation, with which I concur, is confirmed if one looks at successive editions of *The Dictionary of Human Geography*.

Consult the *Dictionary* for main entries on such keywords as 'arms' (or armed anything), 'defence', 'military', 'militarism' and 'war'. These keywords are entirely absent, across four successive editions. In the first edition (Johnston, 1981) only 'defence' merits an entry in the index, as a public good within a dictionary entry on 'neoclassical economics'. In the second edition (Johnston *et al.*, 1986) the index repeats 'defence' and includes only 'war, representation of demographic consequences', leading to an entry on population pyramids showing the huge impact that the First and Second World Wars had on the population pyramid of contemporary France. In the third edition (Johnston *et al.*, 1994), armed forces, 'military' and 'war' are again absent as main entries in the body of the dictionary and there is a gap, where defence might sit, between 'deep ecology' and 'deindustrialization', despite defence's role in the geographies of both. 'Military action' merits an index entry, but only as an example in a main entry on 'catastrophe theory'. 'Military intelligence, geographers in' refers back to a main entry on 'applied geography', highlighting the role of geographers in military agencies (of which more later). 'Military power and urban origins' refers back to an entry on 'urban origins' and the role of militarism in ancient city foundations. But that is all. The fourth edition (Johnston *et al.*, 2000), despite a preface highlighting significant new entries indicative of a changing and violent world (critical geopolitics, ethnic cleansing, globalization, human rights), still has no main entries for any of the armed forces, 'defence', 'military' or 'war'. The index references to 'military action' and 'military power' remain, and the 'war' entry is expanded: 'war, boundary dispute as cause' leads back to the 'sovereignty' entry; 'war, geographers' role during' leads back to 'applied geography'; 'war and sense of place' leads back to 'sense of place' and the significance of battlefield and monuments; 'war memorials' leads back to 'monuments'.

The *Dictionary* is two things. First, it is of course a dictionary, an invaluable and reliable reference book providing definitions of the topics, concepts, theories and methods circulating in contemporary human geography. Second, the *Dictionary* has become something of a

definitional text, establishing the parameters and remit of the contemporary discipline of (broadly, Anglophone) human geography. Successive editions have increased the numbers of entries as the discipline has grown and evolved over the 20 years separating the first and fourth editions. Over this time the *Dictionary* has emerged as a powerful tool in the definition of human geography, what it is – and, through its silences, what it is not. Militarism and military activities, and their associates (defence, armed anything, war) don't merit a main entry (see also Mamadouh, 2005, on this point). They are only discernible at the margins, where they exist in the index as footnotes to different stories.<sup>3</sup> Like the view from my window, these index entries hint at the multiplicity and ubiquity of military geographies, and they provide some clues to where disciplinary engagement lies. But you have to know where to look.

The purpose of this paper is to argue for greater visibility within the discipline of Geography of the geographies of militarism and military activities. It reviews the dominant contemporary approaches to military issues in Anglophone human geography, and argues for a critical approach to the study of the geographies of militarism and military activities that is capable of understanding their full geographical constitution and expression. The first approach discussed is traditional Military Geography, a sub-field of the discipline aimed explicitly at the application of geographical tools and techniques to the solution of military problems. Military Geography, I argue, is limited by the narrowness of its field of vision and by its close identification with the military objectives of the state, which restricts its abilities to grasp fully the disparate and contested geographies of militarism and military activity. The second approach discussed is that which understands the geography of militarism and military activities in terms of the spatiality of armed conflict, predominantly (although not exclusively) that emanating from self-identified political geography. Existing studies, I argue, are significant for their insights into the geopolitical causes and consequences of armed conflict in shaping the world, but are less helpful in generating a fuller understanding of the extent to which militarism and military activities imprint themselves onto social and spatial relations. The third approach discussed is that of an emergent critical military geography that, whilst

recognising the significance of armed conflict, looks beyond it for what this tells us about the wider geographical imprint of militarism and military activities. I select for discussion literatures (self-consciously Geographical or otherwise) on issues relating to the politics of military land use, the political economies and social geographies of a military presence, and the cultural geographies of military representation. The paper concludes with a speculative explanation for the relative invisibility of some military issues within contemporary Anglophone human geography, and suggests two avenues for conceptual and empirical research to take a critical military geography further. I end by arguing for the moral necessity of a politically engaged military geography as a feature of both contemporary human geographical scholarship, and as an essential component of tertiary geographical education.

In this paper, I define 'military geographies' as the geographies both constituted and expressed by military activities and militarism. This definition draws on the work of theorists of militarism, between whom there is debate about the meaning of the term. Some – Smith and Smith (1983) for example – prefer to see 'militarism' as a descriptive rather than an analytic term, defining militarism as the effects of various causes, rather than the cause of various effects. They justify this approach with an observation about the huge variety of outcomes and processes that the term 'militarism' refers to, from high military spending to government by martial law. An alternative and more dominant conceptualisation understands militarism as an analytic term denoting the extension of military influence into civilian social, political and economic spheres (Thee, 1980), a temporally and spatially contingent process (Shaw, 1991; Carlton, 2001), that normalises war and preparations for war (Mann, 1988; Keeble, 1997). Militarism is understood therefore as a process with an effect, and it is the analytic definition of militarism that is used here in order to place emphasis on the executive power of militarism. This definition can be refined further. Johnson (2004), in his coruscating analysis of contemporary US imperialism, draws on the work of Vagts (1959) to make a finer distinction between 'military' (the things a nation requires for defence) and 'militarism' (the prioritising of the institutional promotion and preservation of a nation's armed forces). This distinction is

useful when teasing out military geographies. Following Johnson, I would argue that we can distinguish both:

- geographies of military activities, as the patterning of material entities and social relations across space shaped by the production and reproduction of military capabilities; and
- geographies of militarism, as the shaping of civilian space and social relations by military objectives, rationales and structures, either as part of the deliberate extension of military influence into civilian spheres of life and the prioritising of military institutions, or as a by-product of those processes.

The intention behind this paper is not to dwell here on distinctions between the geographies of militarism and those of military activities, but rather to explore how both constitute what I term 'military geographies'. Nor is this paper an attempt to provide a theory of militarism – its sociology, political economy or politics – as a geographical practice. The intention is to review how militarism's inherent spatiality – its effects on spaces, places, environments and landscapes – has been approached by the discipline of geography.

## **II Military Geography<sup>4</sup>**

The *Dictionary of Human Geography's* silence about 'military geography' is indicative of a deep ambivalence within the discipline about Geography's engagement with military matters. Anglophone geography is not alone in having a history and a present of engagement with the military objectives of the state. Examples include general accounts of geography's disciplinary connections to empire (Unwin, 1992; Godlewska and Smith, 1994; Bell *et al*, 1995; Livingstone, 1998; Mayhew, 2000; Jones and Philips, 2005; Mamadouh, 2005), and specific accounts of the state military/geographical disciplinary nexus in French and German (see Heffernan, 1994, 1998; Clout 2004 on Boulanger, 2002; and particularly Mamadouh, 2005, who deals extensively with these traditions), Latin American (Harvey, 1974; Radcliffe and Westwood, 1996; Radcliffe, 1999; Hewitt, 2001), Israeli (Falah, 1994), Arab world (El-Bushra and Muhammadain, 1992; Hanafi, 1992) and Iranian geographies (Kashani-Sabet, 1998).

Geography and geographers the world over have long been of service to state and/or empire, political entities which have long been associated with the pursuit of military violence.

In Britain, the foundation of the Royal Geographical Society in 1830 was closely bound to the territorial ambitions of the British state, ambitions expressed through military power and control. This connection was manifest both in the activities of the Society in guiding imperial expansion with knowledge of the places forced or coerced into Empire, and also through the close connections of its personnel with the military establishment (Freeman, 1980; Unwin, 1992; Driver, 2000). This close relationship continued into the 20<sup>th</sup> century, particularly during wartime, through the engagement of Geographers in producing descriptions of the world for military and related purposes (see for example May, 1909; MacDonnell, 1911; Cornish, 1916, 1918; Salt, 1925; Cole, 1930; for recent reflections on the wartime roles of geography and geographers in Britain, see Stoddart, 1992; Heffernan, 1996, 2000; Clout and Gosme, 2003). Yet a self-conscious Military Geography failed to root in the UK from these origins. The disciplinary history in the USA is rather different. A School of Geography, History and Ethics was founded at the United States Military Academy West Point in 1818 (Unwin, 1992). This initiated the incorporation of geographers and the pursuit of geographical knowledge at the heart of the US military, in the State Department and the United States Military Academy, in wartime and beyond (see Unwin, 1992; Harris, 1997; Smith 2002). Military Geography exists in the USA as a self-conscious sub-discipline, with disciplinary status through its specialty group within the discipline's professional association, the Association of American Geographers, and close ties remain between the sub-discipline and the military (and I return to this below).

What is Military Geography, exactly? Palka and Galgano define it as 'the application of geographic information, tools, and techniques to military problems' (Palka and Galgano, 2000, p.xi), and there is little in the Military Geography literature that would dispute the accuracy of this definition. Contemporary Military Geography scholarship has two dominant foci. The first

is the study of the effects of the physical environment on military strategy – the ‘terrain and tactics’ approach. Although not exclusively historical, much of the scholarship in this tradition seeks to analyse past military encounters in terms of the physical environment of the battlefield (see, for example, O’Sullivan and Miller, 1983; O’Sullivan, 1991, 2001; Winters *et al*, 1998; Collins, 1998; Galgano, 2000; Henderson, 2000; Grabau, 2000; Lindberg and Todd, 2001; Stephenson, 2003). We should note that explorations of ‘terrain and tactics’ are not the sole preserve of those who call themselves ‘Military Geographers’ – see for example, Doyle and Bennett’s evaluations of terrain in key First World War campaigns (1997, 1999), and Doyle and Bennett’s edited collection of essays on terrain issues (2002). However, this ‘terrain and tactics’ approach, informed by normative assumptions about warfare, and deploying detailed description to explain the outcomes of particular tactics and geopolitical strategies (see Gray and Sloan, 1999), sits comfortably within Military Geography’s definition of itself as an applied discipline. The teaching of strategy and tactics, using geographical information, is a staple of military training academies such as West Point and the US Army War College.

The second focus of Military Geography is that suggested by Palka and Galgano’s definition above, in the application of geographical knowledge to military problems. Examples would include Corson’s (2000) discussion of strategic mobility issues in Military Operations Other Than War contexts; King *et al*’s (2004) discussion of locational analysis in the identification of tropical sites for weapons testing; the use of Geographical Information Systems and remote sensing in defence, training and operations (Herl, 2000; Beck, 2003; contributors to Cutter *et al*, 2003); assessments of the physical and human geography of Iraq (Malinowski, 2003), Afghanistan (Palka, 2004a) and North Korea (Palka, 2004b); and the use of cultural geographical knowledge in military operations (Thompson and Grubbs, 1998).

Military Geography exists as a component of tertiary studies in some US institutions within and beyond the military academy, and is recognised within the institutional structures and

disciplinary definitions in the United States (see Palka, 2004c). However, Military Geography is very much a specialist and minority interest in broader Anglophone human geography. It can boast no journal of its own, no key thinkers of international standing, no wider purchase on academic Geography agendas beyond those mentioned for which I suggest two reasons.

The first revolves around the evolutionary stasis of Military Geography. It has failed to develop along the pathways suggested by developments in the wider discipline, leaving it a largely atheoretical, descriptive geography floating in the wake of a theory-powered, critical social science. To illustrate: Military Geography was defined in 1899 by T. Miller Maguire as the application of topographical and environmental knowledge to the conduct of military campaigns, and the strategic and tactical considerations to be taken into account (Maguire, 1899). Over the twentieth century and into the twenty-first, this understanding of Military Geography has held fast, with only minor refinements. So, for example, Peltier and Percy in a key Military Geography textbook define Military Geography as ‘the application of geographic discipline in the conduct of military affairs. It focuses on the geometry of military situations and on the effect of the location, characteristics, and distribution of environments, peoples, forces, and things upon military activities and thus ultimately upon command decisions’ (1966: 7). It is defined as being concerned with places and regions, their properties and differences, physical and social, and with the way the efficiency of military activities or the solution of military problems is influenced because places are different. It is underpinned by a basic assumption that through the application of ‘geographic sciences’, military science may gain in precision and predictability. More recent definitions differ in detail but little in substance; see Palka and Galgano’s definition above. In their state-of-the-sub-discipline collection (Palka and Galgano, 2000), Peltier and Percy’s analytic framework, distinguishing between systematic, topical, regional approaches, is updated to take account of the changing nature of military operations in the post-war, post-Cold War world to include peacetime and Military Operations Other Than War (MOOTW) contexts as well as war, and the scales at which it might focus (strategic, operational, tactical). However, as the book’s chapters demonstrate, Military Geography has been largely untouched by the power of concepts and theories so crucial in driving forward

scholarship in Geography and other social sciences. The one place where Military Geography might be seen to constitute the leading edge is in the development of Geographical Information Systems and remote sensing. Indeed, as Cloud (2002) makes clear, our contemporary, civilian, academic applications of GIS tools and techniques are of military origin.

A second reason for Military Geography's minority status (and an explanation perhaps for its evolutionary stasis) revolves around the politics of its stated imperatives as an applied social science in service to military objectives. Palka and Galgano's lament is telling, and worth quoting in full:

The demise of military geography among universities and academics coincided with the widespread social and political unrest that occurred in America during the mid-1960s and early 1970s. During that era, anti-war sentiments and a general mistrust of the federal government prompted geographers to become increasingly concerned with being socially, morally, and ecologically responsible in their research efforts and professional affiliations with government agencies. Contributing to the war effort in Vietnam came to be regarded as irresponsible by many members of the AAG. The controversy surrounding the Vietnam War cast a persistent shadow on military geography as an academic discipline throughout the 1970s. (Palka and Galgano, 2000: 3-4)

As they observe, the late 1960s saw in North America the emergence of a self-described radical geography, from the ferment of mass political activism, the civil rights movement, the environmental movement and anti-war protest (Peet, 2000). It is not that radical geographers were not alert to the geographies of militarism and military activities – see, for example, Lacoste's analysis of US bombing strategies on the Red River delta in Vietnam (Lacoste, 1973), Massabni (1977) on violent repression and urban destruction in Beirut, and Roder (1973) on war's effects in Angola and Mozambique. But reticence about engaging with military institutions, coupled with the pressing political imperative of engaging with the geographies of other social struggles, drove geographers away from Military Geography and,

it seems, from the study of militarism's geographies. The critiques of logical positivism, the emergence of Marxist and leftist critiques to the study of geography, and in turn the structuralist and post-structuralist approaches that have followed, provided powerful tools for a politically-engaged human geography. One outcome (of many) has been the emergence (or re-emergence?) of political geography's critiques of the play of international power relations across space, including a critical geopolitics with its efforts at illuminating the ways in which power – particularly military power – is written into and across space (more of this later).

Meanwhile, Military Geography has been left standing, concerned only with the contributions it can make to the pursuit of military objectives, and guided primarily by positivist approaches to the study of social relations and space. Furthermore, the sub-discipline is self-consciously and explicitly 'applied', in that it sees itself as an academic field with direct, practical applications to the conduct of state-sanctioned, organised violence. Military Geography is intimately bound up with the US military, and has been since its inception; Eugene Percy (co-author of Peltier and Percy, 1966) was 'The Geographer' for the US State Department, and key positions in the Military Geography Specialty Group have traditionally been held by military officers teaching, for example, at the United States Military Academy West Point, or academics working under contract on military-related projects.<sup>5</sup> Military Geography facilitates the engagement of the defence sector and state military power with the tertiary education sector (for critical accounts, see Graham, 2005; Mitchell, 2005).<sup>6</sup> Military Geogaphy facilitates military violence. See, for example, Beck's assertion that his use of remote sensing was of great utility to the US military in bombing the Zhawar Kili region's caves during the US's military strikes in Afghanistan in late 2001 (Beck, 2003). See also the collection edited by Malinowski (2003) presenting Iraq for military consumption. Military Geography is intimately tied to, and constitutive of, US military and state discourses of military power, nation-building, territorial defence and expansion, national sovereignty and national security.

Military Geography is thus doubly damned in the eyes of many, both for being an atheoretical, positivist backwater, and for being adjunct to the pursuit of imperial and military power (and all the abuses that this entails) through its stated intention of assisting in US military objectives. Many geographers working within critical or radical, Marxist or leftist approaches would see Military Geography, as currently defined, as not just 'irresponsible' for geographers, but as incompatible with more progressive political concerns such as a critique of military and state discourses of nationhood, security and military power.<sup>7</sup>

One approach to the study of the geographies of military activities, then, has been that proposed by Military Geography, which takes in its current form a view of geographical scholarship as contributory and enabling to wider military ambitions and objectives. This approach, representing the fossilised remains of an older geographical tradition, exists on the margins of contemporary Anglophone human geography, particularly those geographies informed by structuralist and post-structuralist critiques of power and social relations, and guided increasingly by a progressive, emancipatory politics critical of the social consequences of militarism, the use of military power and militarisation. This, perhaps, explains the *Dictionary's* silences; Military Geography is viewed as having little to add to contemporary geographical debates. To illustrate, let me return to my view from my Gateshead window. The question I would pose, looking out at a view littered with the marks of militarism and military activities, is whether the analytic approach suggested by Military Geography is useful in explaining the view. The answer, for Military Geography, would be no. Military Geography is not about explaining the spatial consequences of militarism; it is about contributing to the spatial expression of militarism and military activity.

### **III Studying the geographies of armed conflict**

The second and most visible contemporary approach to the geographies of military activities, within Anglophone human geography, is that taken by political geography towards the study of the geographies of armed conflict. This body of academic literature is visible in the sense that it constitutes a coherent literature on the full spatialities – the spatial consequences – of armed conflict, as well as the more immediate causes and implications for the nation state, and its territories, borders and boundaries, of the physical pursuit of armed violence for political ends. Scholars working on the geographies of armed conflict and its consequences choose varying self-descriptions (political geography, geopolitics, critical geopolitics), depending on their theoretical approach. Of course, none of the literatures designated by these sub-disciplinary name-tags are focused solely on the study of armed conflict, but much of this literature does deal explicitly with the geographical causes and consequences of the pursuit of military violence by nation states and sub-national groups; armed conflict and the existence of the nation state are intimately connected. My intention here is not to add to existing reviews of the ever-expanding body of scholarship in this area (for comprehensive overviews, see O'Loughlin and Anselin, 1992; O'Loughlin and van der Wusten, 1993; Ó Tuathail, 1996; Ó Tuathail and Dalby, 1998; Mamadouh, 1998, 2005; Dodds and Atkinson, 2000; Flint, 2002, 2003a, 2003b, 2003c). The intention, rather, is to select certain themes that have emerged from within the political geography, geopolitics and critical geopolitics literatures, and to ask how contemporary scholarship on these themes contributes to our understanding of the geographical constitution of militarism and military activities.

The first theme is the myriad spatialities of armed conflict, in all the forms that it takes. Armed conflict, as we all know, is inherently spatial in its expression and constitution, and there is a significant body of work promoting the idea that we should think geographically and critically about contemporary military violence. Whether one promotes the idea that, post 9/11, we live in newly violent times, or whether one sees current military violence around the globe as business as usual in a violent world, it is notable that recent military interventions and conflicts – and the novel ways of pursuing military violence that they entail – have prompted a thoughtful, critical and engaged response from those concerned specifically with the

spatialities of these conflicts. The spatiality and territoriality of organised violence, in old and new forms, state-sponsored and dissident, imperial and terrorist, continues to prompt analysis in terms of both activities, and the discourses and power relations in which they sit (Fahrer, 2001; Bankoff, 2003; Flint, 2003c; Thornton, 2003; Brunn, 2004; Gregory, 2004a, 2004b; Harvey, 2003; Ettlinger and Bosco, 2004; Mustafa, 2005).

In addition, specific conflicts have also been analysed with a view to explaining their spatialities; see, for example, interventions and fora on the events and consequences of 11<sup>th</sup> September 2001 (in *Arab World Geographer*, see Flint; Smith; Agnew; Abu-Nimer; McColl; Nijman; Marston and Rouhani; all 2001); the Zapatista uprising (in *Antipode* see Ceceña, 2004; Brand and Hirsch, 2004); the US invasion of Iraq (in *Antipode*, see Kiernan; Ó Tuathail; Agnew; and Roberts et al, all 2003; see also Finkelstein, 2003; Graham, 2004b; Jhaveri, 2004; in *Arab World Geographer* see Falah; Dalby; Dijkink; Lustick; Hixson; Farhan; Shuraydi; Khashan; Reuber; Sidaway; Webster; Murphy and Agnew; all 2003); and the Al-Aqsa intifada, Palestine and the occupied territories (in *Arab World Geographer* see Falah, Nolte, Khashan, Mustafa, McColl, Newman, Halper, Schechla, Khamaisi and Taylor, all 2000; in *Antipode* see Jamoul, 2004; Falah, 2004; Gregory, 2004c; Yiftachel, 2004).

The second theme concerns changing modes of warfare and the consequences of this for the spatiality of armed conflict. A key issue here is the so-called 'Revolution in Military Affairs', interpreted variously as either a step-change in technological capabilities or as a pronounced shift in the origins, symmetry and rationales of armed conflict (see Ek, 2000; Gray, 1997, 2005; Kaldor, 1999). There is much debate as to the precise meaning of this identifiable 20<sup>th</sup> century change in the mode of contemporary warfare. Gray (2005) lists 51 different labels that he identifies as being produced and used to explain the shifting nature of warfare. However defined, it is clear that technological developments coupled with new forms of armed conflict at the sub- and supra-national levels have produced in the late 20<sup>th</sup> and early 21<sup>st</sup> centuries new ways of waging war.

A good example of the shift in the nature of war and the consequences for its spatiality is the urbanisation of warfare, and there is an emergent body of both applied research and scholarly critique seeking to understand the causes and consequences of this. Although the connections between military violence and urban form have long been recognised and examined (see Ashworth, 1991), the dynamics of changing patterns of human settlement and activity at a global scale mean that military violence has come to the city in new guises. This is an issue of concern amongst military strategists and tacticians (see Glenn, 2000; Hills, 2004; Graham, 2005). The urbanisation of warfare has also prompted considerable critical appraisal of its consequences. Contributors to Graham's (2004c) edited collection argue persuasively that changes in the ways that the defence of the city can be imagined have followed profound changes in the city's discursive and material nature. Cities are no longer the bounded fortified spaces of old, but rather spaces of multiple networks and internal boundaries which simultaneously demand and defy fortification and defence. This has consequences for, variously, the forms of armed engagement that take place (Hills, 2004), the types of weapons that are developed and used (Bishop and Philips, 2002) and the physical organisation of urban space (Coaffee, 2003; Farish, 2003).

The third theme identifiable in much of the geographical literature on armed conflict is the changing nature and discourse of security itself (see Campbell, 1998). In this area, some cogent arguments have been made for a conceptualisation of security to include environmental security, concerned with the implications for international security of environmental damage and resource scarcity, and with the military agendas developed in response to such threats (see Homer-Dixon, 1991, 1999; Parkin, 1997; Le Billon, 2001, 2005; Dalby, 2002).

A fourth theme amongst studies of armed conflict is the consequences of warfare for human populations. Although much of this work would not necessarily be identified by its authors as 'political geography', it merits mention here because it constitutes an important strand of work in Geography's engagement with armed violence. Examples include work on the consequences of war for developing nations' economic and social development (Stewart and Fitzgerald, 2001). Or Smallman-Raynor and Cliff's (2004) comprehensive survey of the inter-relationship between disease epidemics and military conflicts, from 1850 to the present. Or the observations of Findlay and Hoy (2000) of the effects of warfare on population in, Iraq where the 1991 Gulf War was followed by soaring infant and child mortality rates (also Arnove, 2003; Kiefer, 1992). Or work on the consequences of the Bosnian war for its people (Ó Tuathail and Dahlman, 2004; Dahlman, 2005) or total war's wider ramifications for civilians (Hewitt, 1987, 1997, 2001). Included here also is work on more general consequences of war over time for landscapes and people, such as Clout's research on France's destruction and recovery following two major wars (Clout, 1997, 1999).

It should be clear from this brief review that Anglophone human geography is engaging systematically with armed conflict and its consequences. Whilst, as Mamadouh (2005) observes, Geography has shifted in the course of the 21<sup>st</sup> century from 'war geography' to a geography of peace, from a Geography in support of military endeavour to a Geography critical of warfare and keen to find ways to contribute to peace, the focus on armed conflicts and issues of territoriality has been maintained. A quick review of three edited collections organised around theme of 'the geography of war and peace', published over the last two decades, bears this out. Whilst the political tone and theoretical bases for these collections varies, (reflecting the circumstances and times of their production), they share an approach which sees Geography's engagement with militarism and military activities as primarily and perhaps exclusively concerned with armed conflict and its effects. Pepper and Jenkins' (1985) contributors seek to make geographical sense of the very real concerns of the early 1980s about the consequences of the Second Cold War, the escalation of military expenditure and the possibility of nuclear annihilation. Kliot and Waterman's (1991) contributors consider the

repercussions of the collapse of the Soviet Union, the passing of cold war, the emergence of a 'new world order' and speculate on the spatiality of conflicts that these shifts might shape. Flint's (2005) contributors update the literatures showing the pluralism of contemporary geographical scholarship in approaching armed conflict, and the variety that conflicts can now take, from ethnic conflicts and peace-keeping to resource wars and the current US administration's 'war on terror'. What all three collections do is equate the study of militarism's geographies with the study of armed conflict. Of course, armed conflict is significant for space and social relations to a degree that is difficult to overstate. However, by squeezing militarism's geographies within the binary of 'war / peace', the wider geographical constitution and expression of militarism and military activities becomes lost.

Military geographies are more than just the study of armed conflict, however significant armed conflict might be for shaping our world and commanding scholarly attention. Armed conflict constitutes the end-point of a range of processes, practices, ideas and arguments which make it possible. Armed conflict is only possible if a whole host of things fall into place. These activities, processes and practices are multiple and various. They range from the manufacture and purchase of weapons, to the recruitment and training of soldiers. They include the availability of potential recruits and the provision of facilities for housing, training, clothing, equipping and mobilising armed personnel. They include activities like knowledge of the spaces of military engagement and the practices which support information and communications technologies used in the conduct of armed conflict. They include all the things that I can see from my upstairs window. These back-room, base-line, support and contributory functions are indispensable to the pursuit of armed conflict. Armed conflict cannot proceed without them, whether it is pursued by vast national military forces or small, local paramilitary groups. In turn, geographical scholarship cannot ignore them, and it is to these other military geographies that I now turn.

#### **IV Beyond armed conflict: other military geographies**

In this section, I want to explore some of the issues suggested by a focus on the full geographical constitution and expression of militarism and military activities. I draw on literatures that deal with non-conflict situations, in order to make the point that a critical military geography needs to look at the totality of military activities and militarism's consequences if we are to understand, fully, the ways in which they are geographically constituted and expressed. I focus here on the politics of military land use and the issues that flow from that, such as the political economies and social geographies of militarism and military activities, and the cultural geographies of military representation.<sup>8</sup> The areas I discuss here are indicative and do not mark the limits of a critical military geography.<sup>9</sup>

In the beginning, there is land. All military forces use land, for bases and barracks, for training, for R&D, for communications infrastructure, depots. The basic fact of the physical presence of the military in a place is simultaneously a prosaic and profound issue. It is prosaic in that it is just there, as indicated by the scale of its presence. I return to this in a moment, but first let us look at the scale of 'just being there'. Westing (1988) estimated that, in 13 advanced economies studied, around 1 per cent of available land was used by military forces. More detailed accounts of the situation in different national contexts are available for Britain (Childs, 1998; Woodward, 2004), France (Doxford and Hill, 1998; Doxford and Judd, 2002) and the US (Cawley and Lawrence 1995), and these bear this out. Many nation states, including the UK and France, also make use of lands leased or otherwise occupied on foreign sovereign territory. Most notable is the United States with its comprehensive encircling band of bases around the world in places including Kuwait, Guam, Japan, the Philippines, Diego Garcia, Spain, Germany, the Azores, Korea, Honduras, Saudi Arabia, Turkey, Iraq, Kosovo, Iceland, Greenland, Italy, Cuba, Puerto Rico, Ecuador, Aruba, Curaçao, Australia and the UK (see Evinger, 1998; Euler and Welzer-Lang, 2000; Lindsay-Poland, 2001; Grossman, 2002; Johnson, 2004). Mapping the US military presence overseas is a on-going task, as the

structures and intents of the US military shift in response to changing US foreign policy objectives. The US presence in Europe during the 1980s (Campbell, 1984; Duke, 1989; Gerson and Birchard, 1991) has changed with the drawdown of troops following the end of the Cold War (Garcia and Nemenzo, 1988; Sharp, 1990), and the global reach of US military power continues to extend (Sanders, 2000; Grossman, 2002). There is a basic geography to the distribution of the military, domestic and overseas.

Then there are the consequences of the military presence. These, too, have a geography, identifiable in the geographical factors which constitute the military presence and its wider effects, and expressed through the consequences for places of the military presence. , Although literature on military economic geographies is sparse. we know, for example, that military bases in home territory potentially make a substantial contribution to local economies in terms of providing labour opportunities for a civilian population and a market for goods and services off-base. However, we also know that the economic benefits of a military establishment on home turf are very difficult to quantify due to a lack of publicly available data, and may well be overstated (EAG/Ecotech, 1996; Solomon, 1996; Parai *et al*, 1996; Warf, 1997; Hooker and Knetter, 1999; Woodward, 2004). Moreover, we know that the economic impacts of military bases occupying or inhabiting territory in other nation states can be very mixed. Whilst employment opportunities for a local civilian population may be great (see for example Rocamora, 1998 on the Philippines), levels of subcontracting vary enormously depending on levels of integration and separation (Warf, 1997). With regard to the social geographies of a military presence, again, whilst this is an under-researched area, they can be very mixed, depending primarily on whether the military in place is a domestic one or a foreign occupying force, and depending on what type of military installation it is. Some people experience proximity to a military base as a source of not only economic but also social security (Tivers, 1999). For others, it can be a threat, a drain on local resources, and a source of problematic behaviour such as the abuse of women, prostitution, gambling and the drugs trade (Sturdevant and Stoltzfus, 1993; Okazawa-Rey, 1997; Rocamora, 1998; Euler and Welzer-Lang, 2000; Shorrock, 2000; Isako-Angst, 2001). What is clear, despite the

lack of research in this area, is the scope for military power to shape economic and social relations in space, and the diversity of outcomes of these processes because of the variety in types of military occupancy and types of localities where this occupancy is played out.

Whilst the economic and social geographies of military establishments has been under-researched, the converse is true for the defence industry. Geography has a rich tradition of investigating both the myriad economic geographies of the defence sector itself, and the wider impacts for regional economies, and national and international patterns of production, distribution and exchange from the identification of the military-industrial complex, through the Cold War, to the contemporary globalized armaments sector. A small selection of examples of work in this area would include Melman, (1970, 1988); Markusen *et al* (1991); Smith(1993); *Economic Geography* special issue, (1993); Law *et al* (1993); Inbar and Zilberfarb (1998); Gray and Markusen (1999); Law (1999); Lumpe (2000); Guay (2001); Bitzinger (2003). Analysis has also focused on the confluence of defence industrial and national security agendas (Lovering, 1990, 2000; Kaldor and Schméder, 1997; Calhoun, 2002; Der Derian, 2001) and the privatisation of military power (Singer, 2004). The conversion of the defence sector has also been subjected to critical scrutiny because of the local, regional, national and sometimes international impacts of this process for economic relations over space and for wider defence-dependent economies (see Jauhainen, 1997; Warf, 1997; Sorenson, 1998; Brzoska, 1999; Brömmelhörster, 2000; BICC, 2005; Markusen and Brzoska, 2000; Markusen and Serfati, 2000; Hooks, 2003). Within conversion debates, as Markusen and Brzoska (2000) acknowledge, there has to date been little work on the implications of military base conversion (see Woodward, 2004). Militarism has an economic geography, although analysis of those economic geographies has been uneven within the discipline.

A further set of consequences which flow from the military use of land, the defence sector more generally, and the economic and social consequences of this, are the responses to and conflicts over militarism and the military presence. These are many and varied, and range

from policy and political debates about military land usage versus military needs, particularly where land is a scarce resource (Rubenson *et al*, 1998; Woodward, 1999, 2004), where there are anticipated deleterious consequences for environments and people (Loomis, 1993; Kuletz, 1998; Niedenthal, 2001; Nokkentved, 2004), to sites of protest where militarism itself is challenged such as Greenham Common (Roseneil, 1995) and Menwith Hill (Wood, 2001).

Finally, we should consider here the cultural geographies of military representation.

Representation, a social practice and strategy through which meanings are constituted and communicated, is unavoidable when dealing with militarism and military activities. Armed Forces, and defence institutions, take great care in producing and promoting specific portrayals of themselves and their activities in order to legitimise and justify their activities in places, spaces, environments and landscapes. There is a growing body of work which attends to these representational practices in order to tease out the narratives which are produced to explain military power and presence. See, for example, Ferguson and Turnbull (1998) on Hawaii, Kuletz (1998) on the US western deserts, Atkinson and Cosgrove (1998) on Rome, Tivers (1999) on Aldershot in southern England, and Woodward (1999, 2001) on Otterburn in northern England. See also Steinberg and Taylor (2003) on representations of civil war and insurgency in Guatemala. Representational strategies are also unavoidable, because they are a mechanism with which military personnel, military institutions and civilians make sense of war and the losses it brings (see Hoffenberg, 2001; Stangl, 2003; Marshall, 2004). See, for example, Azaryahu (2003) on the ways in which memory is reconfigured at the former concentration camp at Buchenwald, or Charlesworth and Addis (2002) and Charlesworth (2004) on changing interpretations of concentration camps in Poland. The memorials to the 1914-1918 world war continue to fascinate and inspire despite the distance of that conflict to us now (Heffernan, 1995; Morris, 1997; King, 1998; Johnson, 2003; Gough, 2004; Foster, 2004; Inglis, 2005).

My argument is that these activities associated with 'just being there' have their own geographies. These activities are geographically constituted, in that they require and draw upon the resources (material or discursive) of spaces and places, environments and landscapes, in order to come into being. They are geographically expressed, in that they imprint themselves across those same spaces, places, environments and landscapes. Furthermore, these military geographies also have a far wider imprint than armed conflict, marking and shaping places and spaces far distant from the points of military engagement – including those that I see from my window. They impinge upon other geographies, of production, reproduction, circulation, exchange and representation, of material entities and discursive constructions. Military geographies, therefore, need to be understood not only as the study of the causes and consequences of armed conflict, but also as the study of those military activities which make armed conflict possible. The literature reviewed in this section indicates, however, that research interest in these wider military geographies has been uneven.

## **V Conclusions: The imperative of military geographies**

Paul Virilio was emphatic --all geography is military geography; his point being one about the pervasiveness of militarism and military activities in shaping all our geographies (see Luke and Ó Tuathail, 2000). Yves Lacoste (1976) was equally emphatic, that geography is first of all about war (see Mamadouh, 2005). These could, perhaps, be regarded as hyperbolic statements, but they are certainly pertinent about the centrality of war, military violence, and all the things that make this possible, for shaping social relations across space. There is, as this paper has shown, a strong tradition of geographical scholarship which focuses on the play of military power, as expressed by military violence, over space. However, as I have suggested, the *complete extent* of militarism's geographical constitution and expression demand closer scrutiny and explanation than perhaps they have received to date. To put this

another way, if all geographies are military in some way, the actual pursuit of armed conflict is only part of the story. Other parts of the narrative are significant too.

If other parts of the narrative are significant – those aspects discussed in Section IV – then why has Anglophone human geography been less attentive to them? Why is a self-conscious, critical, reflexive military geography either absent or less visible within this body of scholarship? This is something that has long puzzled me. In Part 2, I set out one explanation as to why this should be so. There are other explanations as well; geography is a small discipline, in national and international terms and/or, surely it cannot be expected to do everything? Yet as I argue below, there are moral reasons for pursuing with greater vigour and purpose the question of military control over spaces and places, environments and landscapes.

Another explanation lies with the nature of military geographies. They are hard to research. Information is often not available because it just has not been collected, or is not available in forms that have any real utility for social scientific research. Data is often withheld, judged secret in the interests of national security. To illustrate: in the UK there are no publicly available aggregated figures on disposals (sales) of defence estate property and lands in the UK below country level (England, Scotland, Wales, Northern Ireland). Research on the UK defence estate, its size, management, use and disposal is thus hampered from the very beginning. This absence of data is repeated again and again if one looks at issues such as military economic geographies, the social geographies of a military presence, military effects on the environment, and so on. It limits research, and as I argue elsewhere (Woodward, 2004), it constitutes, wittingly or not, a strategy for military control over space.

A final explanation relates to a set of powerful national discourses, or national myths, circulating in economically advanced nations in the post-war period (particularly the UK and

USA), that have promoted the idea that 'we' are at peace, that violent armed conflict is something that other nations do. This, of course, is utter nonsense if one looks at the record of military engagements conducted by both the UK and USA since 1945. However, it is a powerful idea which has maintained an illusion that military capabilities and military activities, as well as militarism itself, are but a minor element of the nation's concerns. Perhaps this accounts for the relative invisibility of militarism's geographies within the discipline. This myth has well and truly splintered now, of course, with the use of military force in places such as Afghanistan and Iraq (amongst others), and time will tell whether the resurgence of visibility of military activities prompts a resurgence of interest in the full geographies that those activities produce. There are reasons to hope that it does, although there are also reasons for pessimism, given the power of militarism to naturalise and legitimate military action and to obscure its effects (including its geographies) from critical gaze. This naturalising facilitates and legitimates military control over space, place, environments and landscapes.

Yet we should not give up too easily; just because things are difficult to research does not mean that they should not or cannot be done. I suggest two avenues for conceptual and empirical study, to take a critical military geography further. The first of these is a fuller conceptualisation of militarism and military power. As Allen (1999, 2004) observes, drawing on Mann (1988) in his examination of the 'lost geographies of power', power in military networks is highly concentrated, coercive and mobilised, relative to place, yet limited when stretched. Military power, military control, lies at the root of military geographies. Yet there are very few (any?) existing accounts which explain exactly how military power works to produce the geographies that it does. Its potential and limits need describing and explaining if we are to understand militarism's controls over space. Specifically, its methods of operation through physical controls over space, controls over data and information, controls over systems of governance and controls over representational strategies seem to be crucial (see Woodward, 2004). A critical military geography should not just describe the outcomes of military power and control, but needs also to explain the origins of that control and the mechanisms by which it operates.

The second avenue for research is that which takes the small, the unremarkable, the commonplace things that military activities and militarism make and do, and traces the networks or connections between them. It is often the seemingly prosaic things, the things that lurk at the edge of the big picture, which can tell us much about how systems (be they material or discursive or both) operate. Things that seem mundane are often protected by their ordinariness from critical gaze. The most interesting stories, lie in the connections between many seemingly small things that build a bigger picture, revealing networks. Think, for example, of the supply chains linking the design and manufacture of a weapon like the AK47 (Kalashnikov), and the deployment of these easy-to-use weapons in violent conflicts, large and small. Or the connections between the political economy of heavy artillery production and these systems' environmental impacts in training and war. I could go on, but the point is a simple one; that the escalation of armed conflict should not distract us from paying attention to the little things that make armed conflict possible. In the words of Arundhati Roy, 'The threshold of horror has been ratcheted up so high that nothing short of genocide or the prospect of nuclear war merits mention.' (Roy, 2003: 4). Even ostensibly mundane military geographies deserve exploration.

My final point is about the imperatives for doing military geographies. We live in a violent, militarised world, even if many of us are, insulated from many of the more appalling and horrific effects of that violence. Our research and teaching should reflect that we live surrounded by military violence; indeed, it is imperative that it does. Studying military geographies means making a moral judgement to think critically not just about militarism, the moral basis of militarisation and military activities, and the morality of the use of organised violence for political and economic ends, but also about the moral consequences of states of militarism and military preparedness. Studying military geographies means putting not just armed conflict within our sights, but also all the things that make armed conflict possible in the first place. Military geographies, in the sense that I have outlined in this paper, make war real;

they bring the battles back to the home front. This can only be a good thing. As Ignatieff puts it,

If war becomes unreal to the citizens of modern democracies, will they care enough to restrain and control the violence exercised in their name?' (Ignatieff, 2000: 4; see also Gray, 1997 on this issue).

The moral imperative is particularly pertinent for academics. As Cohen writes,

Intellectuals who keep silent about what they know, who ignore the crimes that matter by moral standards, are even more morally culpable when their society is free and open. They can speak freely, but choose not to. (Cohen, 2001: 286)

The moral imperative extends to tertiary education. There is a long history of engagement between geography curricular and studies of international relations (see Marsden, 2000), and geography is potentially well-placed to teach about political violence (Gallaher, 2004). Whilst much of the subject-matter of military geographies may not necessarily be pleasant to teach or think about, it is certainly necessary. Although writing about photographic representations of violence, Susan Sontag's words are pertinent here:

... it seems a good in itself to acknowledge, to have enlarged, one's sense of how much suffering caused by human wickedness there is in the world we share with others. Someone who is perennially surprised that depravity exists, who continues to feel disillusioned (or even incredulous) when confronted with evidence of what humans are capable of inflicting in the way of gruesome, hands-on cruelties upon other humans, has not reached moral or psychological adulthood. No one after a certain age has the right to this kind of innocence, of superficiality, to this degree of ignorance, or amnesia.' (Sontag, 2003: 102.)

### **Acknowledgements:**

This paper was written whilst I was a Visiting Fellow at the Defence Studies Forum, Australian Defence Force Academy in Canberra, and I would like to record my thanks to my hosts for

their hospitality and for granting me access to such wonderful library facilities. The opinions expressed in this paper are my own.

## References

- Abu-Nimer, M. 2001: Another voice against the war. *Arab World Geographer* 4 (2), on-line edition.
- Agnew, J. 2001: Not the wretched of the earth: Osama Bin Laden and the clash of the civilizations. *Arab World Geographer* 4 (2), on-line edition.
- Agnew, J. 2003: American hegemony into American empire? Lessons from the invasion of Iraq. *Antipode* 35, 871-885.
- Agnew, J. 2003: Learning from the war on Iraq. *Arab World Geographer* 6 (1), on-line edition.
- Allen, J. 1999: Power. In Massey, D., Allen, J. and Sarre, P., editors, *Human geography today*, Cambridge: Polity Press, 194-218.
- Allen, J. 2004: *Lost geographies of power*. Oxford: Blackwell.
- Arnove, A. 2003: Editor, *Iraq under siege: The deadly impact of sanctions and war*. London: Pluto Press.
- Ashworth, G.J. 1991: *War and the city*. London: Routledge.
- Atkinson, D. and Cosgrove, D. 1998: Urban rhetoric and embodied identities: city, nation and empire at the Vittorio Emanuele II monument in Rome, 1870-1945. *Annals of the Association of American Geographers* 88, 28-49.
- Azaryahu, M. 2003: RePlacing memory: the reorientation of Buchenwald. *Cultural Geographies* 10, 1-20.
- Bankoff, G. 2003: Regions of Risk: western discourses on terrorism and the significance of Islam. *Studies in Conflict and Terrorism* 26, 413-428.
- Bateman, M. and Riley, R. 1987: Editors, *The geography of defence*. London: Croom Helm.
- Beck, R.A. 2003: Remote sensing and GIS as counterterrorism tools in the Afghanistan War: A case study of the Zhawar Kili Region. *The Professional Geographer* 55, 170-179.

- Bell, M., Butlin, R. and Heffernan, M. 1995: Editors, *Geography and imperialism, 1820-1940*. Manchester: Manchester University Press.
- BICC: Bonn International Centre for Conversion 2005: *Conversion survey 2005: Global disarmament, demilitarization and demobilization*. Baden-Baden, Nomos Verlagsgesellschaft.
- Bishop, R. and Phillips, J. 2002: Unmanning the homeland. *International Journal of Urban and Regional Research* 26, 620-625.
- Bitzinger, R. 2003: Editor, *Towards a brave new arms industry? The decline of the second-tier arms-producing countries and the emerging international division of labour in the defence industry*. Oxford: Oxford University Press.
- Brand, U. and Hirsch, J. 2004: In search of emancipatory politics: the resonances of *Zapatism* in western Europe. *Antipode* 36, 371-382.
- Brömmelhörster, J. 2000: Editor, *Demystifying the peace dividend*. Baden-Baden, Nomos Verlagsgesellschaft.
- Brunn, S. 2004: Editor, *11 September and its aftermath: The geopolitics of terror*. London: Frank Cass.
- Brzoska, M. 1999: Military conversion: the balance sheet. *Journal of Peace Research* 36, 131-140.
- Calhoun, C. 2002: editor, Militarism, *Dictionary of the Social Sciences*. Oxford: Oxford University Press.
- Campbell, D. 1984: *The unsinkable aircraft carrier: American military power in Britain*. London: Michael Joseph.
- Campbell, D. 1998: *Writing security: US foreign policy and the politics of identity*. Revised edition. Minneapolis, University of Minnesota Press.
- Carlton, E. 2001: *Militarism: rule without law*, Aldershot: Ashgate.
- Cawley, R.M. and Lawrence, R.M. 1995, National security policy and federal lands policy, or, the greening of the Pentagon. In Crotty, W. editor, *Post-Cold War policy: The social and domestic context*, Chicago: Nelson Hall, 274-292.
- Ceceña, A.E. 2004: The subversion of historical knowledge of the struggle: *Zapatistas* in the twenty-first century. *Antipode* 36, 361-370.

- Charlesworth, A. 2004: A corner of a foreign field that is forever Spielberg's: understanding the moral landscapes of the site of the former KL Płaszow, Kraków. *Cultural Geography* 11, 291-312.
- Charlesworth, A. and Addis, M. 2002: Memorialisation and the ecological landscapes of Holocaust sites: the cases of Płaszow and Auschwitz-Birkenau. *Landscape Research* 27, 229-251.
- Childs, J. 1998: *The military use of land: A history of the defence estate*. Bern: Peter Lang AG.
- Cloke, P. and Johnston, R. 2005: *Spaces of geographical thought: deconstructing human geography's binaries*. London: Sage.
- Cloud, J. 2002: American cartographic transformations during the Cold War. *Cartography and Geographic Information Science* 29, 261-282.
- Clout, H. 1997: War and recovery in the countryside of north-eastern France: the example of the Meurthe-et-Moselle. *Journal of Historical Geography* 23, 164-186.
- Clout, H. 1999: Destruction and revival: the example of Calvados and Caen, 1940-1965. *Landscape Research* 24, 117-139.
- Clout, H. 2004: Review of Boulanger, P., 2002, *La Géographie militaire française, 1871-1939*. Economica, Paris. *Journal of Historical Geography* 30, 188-190.
- Clout, H. and Gosme, C. 2003: The naval intelligence handbooks: A monument in geographical writing. *Progress in Human Geography* 27, 153-173.
- Coaffee, J. 2003: *Terrorism, risk and the city: The making of a contemporary urban landscape*. London: Ashgate.
- Cohen, S. 2001: *States of denial: knowing about atrocities and suffering*. Cambridge: Polity.
- Cole, D.H. 1930: *Imperial military geography: general characteristics of the empire in relation to defence*. London: Sifton Praed.
- Collins, J.M. 1998: *Military geography for professionals and the public*. Washington DC, Brassey's.
- Cornish, V. 1916, *Naval and military geography of the British Empire: Considered in relation to the war with Germany*. London: Hugh Rees.

- Cornish, V. 1918: *The strategic geography of the Great Powers*. London: George Philip and Son.
- Corson, M.W. 2000; Strategic mobility in the 21<sup>st</sup> century: projecting national power in a MOOTW environment. In Palka, E.J. and Galgano, F.A., editors, *The scope of military geography: Across the spectrum from peacetime to war*, New York: McGraw Hill, 233-262.
- Cutter, S.L., Richardson, D.B. and Wilbanks, T.J. 2003: Editors, *The geographical dimensions of terrorism*. New York: Routledge.
- Dahlman, C. 2005: Geographies of genocide and ethnic cleansing: the lessons of Bosnia-Herzegovina. In Flint, C., editor, *The geography of war and peace: From death camps to diplomats*. Oxford: Oxford University Press, 174-197.
- Dalby, S. 2001: Classics in human geography revisited, Commentary 1, on Hepple's 'The revival of geopolitics', (1986), *Progress in Human Geography* 25, 423-424.
- Dalby, S. 2002: *Environmental Security* Minneapolis: University of Minnesota Press.
- Dalby, S. 2003: Geopolitics, the Bush doctrine, and war on Iraq. *Arab World Geographer* 6 (1), on-line edition.
- Dandeker, C. 2000: Armed forces and society research in the UK: A review of British military sociology. In Kümmel, G. and Prüfert, A.D., editors, *Military sociology: The richness of a discipline*, Baden-Baden, Nomos Verlagsgesellschaft, 68-90.
- Der Derian, J. 2001: *Virtuous war: mapping the military-industrial-media-entertainment network*. Boulder, Westview Press.
- Dijkink, G. 2003: World police, unilateralism, and the future of a country. *Arab World Geographer* 6 (1), on-line edition.
- Dodds, K. and Atkinson, D. 2000: editors, *Geopolitical traditions: A century of geopolitical thought*. London: Routledge.
- Doxford, D. and Hill, A. 1998: Land use for military training in the UK: the current situation, likely developments and possible alternatives. *Journal of Environmental Planning and Management* 41, 279-97.

- Doxford, D. and Judd, A. 2002: Army training: the environmental gains resulting from the adoption of alternatives to traditional training methods. *Journal of Environmental Planning and Management* 45, 279-65.
- Doyle, P. and Bennett, M. 1997: Military geography: terrain evaluation and the British Western Front, 1914-191. *Geographical Journal* 163, 1-24.
- Doyle, P. and Bennett, M. 1999: Military geography: the influence of terrain in the outcome of the Gallipoli Campaign, 1915. *Geographical Journal* 165, 12-36.
- Doyle, P. and Bennett, M. 2002: Editors, *Fields of battle: Terrain in military history*. Amsterdam: Kluwer.
- Driver, F. 2000: *Geography militant: cultures of exploration and empire*. Oxford: Blackwell.
- Duke, S. 1989: *United States military forces and installations in Europe*. Oxford: Oxford University Press.
- EAG/Ecotech 1996: *The impact of the peace dividend on rural England*. Salisbury: Rural Development Commission.
- Ek, R. 2000: A revolution in military geopolitics. *Political Geography* 19, 841-874.
- El-Bushra, E-S., and Muhammadain, M.M. 1992: Perspectives on the contribution of Arabs and Muslims to geography. *GeoJournal* 26, 157-66.
- Enloe, C. 1983: *Does khaki become you? The militarisation of women's lives*. London: Pluto.
- Enloe, C. 2000: *Maneuvers: The international politics of militarizing women's lives*. Berkeley, University of California Press.
- Ettlinger, N. and Bosco, F. 2004: Thinking through networks and their spatiality: a critique of the US (public) war on terrorism and its geographic discourse. *Antipode* 36, 249-271.
- Euler, C. and Welzer-Lang, D. 2000: *Developing best professional practice for reducing sexual abuse, domestic violence and trafficking in militarised areas of peacetime Europe*. Leeds: Research Centre for Violence, Abuse and Gender Relations, Leeds Metropolitan University, UK.
- Evinger, W.R. 1998: *Directory of US military bases worldwide*. Third Edition. New York: Oxryx Press.
- Fahrer, C. 2001: The geography of Egypt's Islamist insurgency. *Arab World Geographer* 4, on-line edition.

- Falah, G. 1994: The frontier of criticism in Israeli geographic practice. *Area* 26, 1-13.
- Falah, G. 2000: Editorial. *Arab World Geographer* 3 (3), on-line edition.
- Falah, G. 2003: Whose war? *Arab World Geographer* 6 (1), on-line edition.
- Falah, G-W. 2004: Truth at war and naming the intolerable in Palestine. *Antipode* 36, 596-600.
- Farhan, Y. 2003: The illegitimate and shameless war on the Iraqi homeland and the Iraqi people. *Arab World Geographer* 6 (1), on-line edition.
- Farish, M. 2003: Disaster and decentralisation: American cities and the Cold War. *Cultural Geographies* 10, 125-148.
- Ferguson, K.E. and Turnbull, P. 1998: *Oh, say, can you see? The semiotics of the military in Hawaii*. Minneapolis: University of Minnesota Press.
- Findlay, A.M. and Hoy, C. 2000: Global population issues: towards a geographical research agenda. *Applied Geography* 20, 207-219.
- Finkelstein, N. 2003: Prospects for ending the occupation. *Antipode* 35, 839-845.
- Flint, C. 2001: Initial thoughts towards political geographies in the wake of September 11, 2001: An introduction. *Arab World Geographer* 4 (2), on-line edition.
- Flint, C. 2002: Political geography: globalisation, metapolitical geographies and everyday life. *Progress in Human Geography* 26, 391-400.
- Flint, C. 2003a: Political Geography II: terrorism, modernity, governance and governmentality. *Progress in Human Geography* 27, 97-106.
- Flint, C. 2003b: Political Geography: context and agency in a multi-scalar framework. *Progress in Human Geography* 27, 627-636.
- Flint, C. 2003c: Terrorism and counter-terrorism: geographic research questions and agendas. *The Professional Geographer* 55, 161-169.
- Flint, C. 2005: editor, *The geography of war and peace: From death camps to diplomats*. Oxford: Oxford University Press.
- Foster, J. 2004: Creating a temenos positing 'South Africanism': national memory, landscape practice and the circulation of identity at Delville Wood. *Cultural Geography* 11, 259-290.

- Freeman, T.W. 1980: The Royal Geographical Society and the development of geography. In Brown, E.H., editor, *Geography Yesterday and Tomorrow*, Oxford: Oxford University Press, 1-99.
- Galgano, F.A. 2000: Streams and the Civil War landscape: The battle for Island No.10, Mississippi River, 1862. In Palka, E.J. and Galgano, F.A., editors, *The scope of military geography: Across the spectrum from peacetime to war*, New York: McGraw Hill, 31-52.
- Gallaher, C. 2004: Teaching about political violence: a primer on representation. *Journal of Geography in Higher Education* 28, 301-317.
- Garcia, E. and Nemenzo, F. 1988: *The sovereign quest: Freedom from foreign military bases*. Quezon: Claretian Publications.
- Gerson, J. and Birchard, B. 1991: editors, *The sun never sets... Confronting the network of foreign US military bases*. Boston: South End Press.
- Glenn, R. 2000: *Capital preservation: Preparing for urban operations in the 21<sup>st</sup> century*. Santa Monica: RAND.
- Godlewska, R. and Smith, N. 1994: editors, *Geography and empire*. Oxford: Blackwell.
- Gough, P. 2004: Sites in the imagination: the Beaumont Hamel Newfoundland Memorial on the Somme. *Cultural Geographies* 11, 235-258.
- Grabau, W.E. 2000: *98 Days: A geographer's view of the Vicksburg Campaign*. University of Tennessee Press.
- Graham, S. 2004a: Introduction: Cities, war and states of emergency. In Graham, S., editor, *Cities, war and terrorism: Towards an urban geopolitics*. Oxford: Blackwell, 2-25.
- Graham, S. 2004b: Vertical geopolitics: Baghdad and after. *Antipode* 36, 12-23.
- Graham, S. 2004c: editor, *Cities, war and terrorism: Towards an urban geopolitics*. Oxford, Blackwell.
- Graham, S. 2005: Remember Fallujah: demonising place, constructing atrocity. *Environment and Planning D: Society and Space* 23, 1-10.
- Gray, C.H. 1997: *Postmodern war: The new politics of conflict*. New York: The Guilford Press.
- Gray, C.H. 2005: *Peace, war, and computers*. New York, Routledge.

- Gray, C.S. and Sloan, G. 1999: editors, *Geopolitics: geography and strategy*. London: Frank Cass.
- Gray, M. and Markusen, A. 1999: Colorado Springs: A military anchored city in transition. In Markusen, A., Lee, Y-S, and Di Giovanna, S., editors, *Second tier cities*, Minneapolis, University of Minnesota Press, 311-332.
- Gregory, D., Martin, R. and Smith, G. 1994: editors, *Human Geography: Society, Space and Social Science*. London: Macmillan.
- Gregory, D. 2004a: *The Colonial Present*. Oxford: Blackwell.
- Gregory, D. 2004b: The Angel of Iraq. *Environment and Planning D: Society and Space* 22, 317-324.
- Gregory, D. 2004c: Palestine under siege. *Antipode* 36, 601-606.
- Gregory, D. and Walford, R. 1989: editors, *Horizons in human geography*. London: Macmillan.
- Grossman, Z. 2002: New US military bases. *Counterpunch* 2<sup>nd</sup> February, on-line edition.
- Guay, T. 2001: *At arm's length: The European Union and Europe's defence industry*. London: Palgrave Macmillan.
- Halper, J. 2000: The struggle for control, the end of a paradigm. *Arab World Geographer* 3 (3), on-line edition.
- Hanafi, H. 1992: World-views of Arab geographers. *GeoJournal* 26, 153-56.
- Harris, C.D. 1997: Geographers in the US Government in Washington DC, during World War II. *Professional Geographer* 49, 245-256.
- Harvey, D. 1974: What kind of geography for what kind of public policy? *Transactions of the Institute of British Geographers* 63, 18-24.
- Harvey, D. 2003: *The New Imperialism*. Oxford: Oxford University Press.
- Heffernan, M. 1994: A state scholarship: the political geography of French international science during the 19<sup>th</sup> century. *Transactions of British Geographers* 19, 21-45.
- Heffernan, M. 1995: For ever England: The Western Front and the politics of remembrance in Britain. *Ecumene* 2, 293-323.

- Heffernan, M. 1996: Geography, cartography and military intelligence: The Royal Geographical Society and the First World War. *Transactions of the Institute of British Geographers* 21, 504-533.
- Heffernan, M. 1998: *The meaning of Europe: Geography and geopolitics*. London: Arnold.
- Heffernan, M. 2000: Professor Penck's bluff: Geography, espionage and hysteria in World War I. *Scottish Geographical Journal* 116, 267-282.
- Henderson, J.P. 2000: Military geography of the Civil War: The Blue Ridge and Valley and Ridge province. In Palka, E.J. and Galgano, F.A., editors, *The scope of military geography: Across the spectrum from peacetime to war*. New York: McGraw Hill, 53-73.
- Herl, B.K. 2000: Integrated military land management: The warfighter's terrain perspective. In Palka, E.J. and Galgano, F.A., editors, *The scope of military geography: Across the spectrum from peacetime to war*. New York: McGraw Hill, 411-436.
- Hewitt, K. 1987: The social space of terror: towards a civil interpretation of total war. *Environment and Planning D: Society and Space* 5, 445-474.
- Hewitt, K. 1997: *Regions of risk: A geographical introduction to disasters*. Harlow: Longman.
- Hewitt, K. 2001: Between Pinochet and Kropotkin: state terror, human rights and the geographer. *The Canadian Geographer* 45, 338-355.
- Hills, A. 2004: *Future war in cities: Rethinking a liberal dilemma*. London: Frank Cass.
- Hixson, W.L. 2003: The war on Iraq and American freedom. *Arab World Geographer* 6 (1), on-line edition.
- Hoffenberg, P.H. 2001: Landscape, memory and the Australian war experience, 1915-18. *Journal of Contemporary History* 36, 111-131.
- Homer-Dixon, T. 1991: On the threshold: environmental changes as causes of acute conflict. *International Security* 16, 76-116.
- Homer-Dixon, T. 1999: *Environment, security and violence*. Princeton: Princeton University Press.
- Hooker, M. and Knetter, M. 1999: *Measuring the economic effects of military base closures*. National Bureau of Economic Research Working Paper 6941. Cambridge, MA: NBER.

- Hooks, G. 2003: Military and civilian dimensions of America's regional policy, 1972-1994. *Armed Forces and Society* 29, 227-251.
- Ignatieff, M. 2000: *Virtual war: Kosovo and beyond*. New York: Metropolitan Books.
- Inbar, E. and Zilberfarb, B. 1998: editors, *The politics and economics of defence industries*. London: Frank Cass.
- Inglis, K.S. 2005: *Sacred places: War memorials in the Australian landscape*. Melbourne: University of Melbourne Press.
- Isako Angst, L. 2001: The sacrifice of a schoolgirl: the 1995 rape case, discourses of power, and women's lives in Okinawa. *Critical Asian Studies* 33, 243-266.
- Jamoul, L. 2004: Palestine – In search of dignity. *Antipode* 36, 581-595.
- Jauhiainen, J. 1997: Militarisation, demilitarisation and re-use of military areas: the case of Estonia. *Geography* 82, 118-126.
- Jhaveri, N. 2004: Petroimperialism: US oil interests and the Iraq war. *Antipode* 36, 2-11.
- Jones, R. and Phillips, R. 2005: Unsettling geographical horizons: exploring premodern and non-European imperialism. *Annals of the Association of American Geographers* 95, 141-161.
- Johnson, N. 2003: *Irish nationalism and the geography of remembrance*. Cambridge: Cambridge University Press.
- Johnson, C. 2004: *The sorrows of empire: militarism, secrecy and the end of the republic*. New York: Metropolitan Books.
- Johnston, R.J. 1981: editor, *The dictionary of human geography*. First edition. Oxford: Blackwell, Oxford.
- Johnston, R.J. and Claval, P. 1984: editors, *Geography since the Second World War: An international survey*. London: Croom Helm.
- Johnston, R.J., Gregory, D. and Smith, D.M. 1986: editors, *The dictionary of human geography*. Second edition. Oxford: Blackwell.
- Johnston, R.J., Gregory, D. and Smith, D.M. 1994: *The dictionary of human geography*. Third edition. Oxford: Blackwell.
- Johnston, R.J., Gregory, D., Pratt, G. and Watts, M. 2000: *The dictionary of human geography*. Fourth edition. Oxford: Blackwell.

- Kaldor, M. 1999: *New and old war: Organized violence in a global era*. Cambridge: Polity Press.
- Kaldor, M. and Schméder, G. 1997: *The European rupture: the defence sector in transition*. Cheltenham: Edward Elgar.
- Khamaisi, R. 2000: 'Intifada al-Aqsa' – the perpetuation of the situation or a turning point in Israel's relation to its Arab-Palestinian citizens? *Arab World Geographer* 3 (3), on-line edition.
- Khashan, H. 2000: An Intifada for peace and against its process. *Arab World Geographer* 3 (3), on-line edition.
- Khashan, H. 2003: Baghdad's new Mongols. *Arab World Geographer* 6 (1), on-line edition.
- Kashani-Sabet, F. 1998: Picturing the homeland: geography and national identity in late nineteenth and early twentieth century Iran. *Journal of Historical Geography* 24, 413-430.
- Keeble, R. 1997: *Secret state, silent press: New militarism, the Gulf and the modern image of warfare*. Luton: University of Luton Press.
- Kiefer, C.W. 1992: Militarism and world health. *Social Science and Medicine* 34, 719-724.
- Kiernan, B. 2003: 'Collateral damage' from Cambodia to Iraq. *Antipode* 35, 856-870.
- King, A. 1998: *Memorials of the Great War in Britain: The symbolism and politics of remembrance*. Oxford: Berg.
- King, W.C., Palka, E.J. and Harmon, R. S. 2004: Identifying optimum locations for tropical testing of United States Army materièl and systems. *Singapore Journal of Tropical Geography* 25, 92-108.
- Kliot, N. and Waterman, S. 1991: editors, *The political geography of conflict and peace*. London: Belhaven.
- Kuletz, V. 1998: *The tainted desert: Environmental and social ruin in the American West*. London: Routledge.
- Lacoste, Y. 1973: An illustration of geographical warfare: Bombing of the dikes on the Red River, North Vietnam. *Antipode* 5, 1-13.
- Lacoste, Y. 1976: *La Géographie, ça sert, d'abord, à faire la guerre*. Paris: Maspéro.

- Law, R., Wolch, J. and Takahashi, L. 1993: Defense-less territory: workers, communities and the decline of military production in Los Angeles. *Environment and Planning C* 11, 291-315.
- Law, A. 1999: Melting the Cold War permafrost: restructuring military industry in Scotland. *Antipode* 31, 421-452.
- Le Billon, P. 2001: The political ecology of war: natural resources and armed conflicts. *Political Geography* 20, 561-84.
- Le Billon, P. 2005: Editor, *The geopolitics of resource Wars: Resource dependence, governance and violence*. London: Frank Cass.
- Lindberg, M. and Todd, M. 2001: *Brown-, green- and blue-water fleets: The influence of geography on naval warfare, 1861 to the present*. Westport: Praeger.
- Lindsay-Poland, J. 2001: US military bases in Latin America and the Caribbean. *Foreign Policy in Focus* 6, on-line edition.
- Livingstone, D. 1998: *The geographical tradition: Episodes in the history of a contested enterprise*. Oxford: Blackwell.
- Loomis, D. 1993: *Combat Zoning: Military Land Use Planning in Nevada*. Reno: University of Nevada Press.
- Lovering, J. 1990: Military expenditure and the restructuring of capitalism: the military industry in Britain. *Cambridge Journal of Economics* 14, 453-467.
- Lovering, J. 2000: Loose cannons: creating the arms industry in the 21<sup>st</sup> century. In Kaldor, M., editor, *Global insecurity: Restructuring the global military sector*. Vol. III, London: Pinter, 147-176.
- Luke, T. and Ó Tuathail, G. 2000: Thinking geopolitical space: the spatiality of war, speed and vision in the work of Paul Virilio. In Crang, M. and Thrift, N., editors, *Thinking space*, London: Routledge, 360-379.
- Lumpe, L. 2000: editor, *Running guns: The global black market in small arms*. New York: Zed Books.
- Lustick, I.S. 2003: America's war and Osama's script. *Arab World Geographer* 6 (1), on-line edition.
- MacDonnell, A.C. 1911: *Outlines of military geography*. London: Hugh Rees.

- Maguire, T.M. 1899: *Outlines of military geography*, Cambridge: Cambridge University Press.
- Malinowski, J. 2003: editor, *Iraq: geographic perspectives*. New York: McGraw Hill.
- Mamadouh, V. 1998: Geopolitics in the Nineties: one flag, many meanings. *GeoJournal* 46, 237-253.
- Mamadouh, V. 2005: Geography and war, geographers and peace. In Flint, C., editor, *The geography of war and peace: From death camps to diplomats*. Oxford: Oxford University Press, 26-60.
- Mann, M. 1988: *States, war and capitalism*. Oxford: Blackwell.
- Markusen, A., Hall, P., Campbell, S. and Deitrick, S. 1991: *The rise of the gunbelt: The military remapping of industrial America*. Oxford: Oxford University Press.
- Markusen, A. and Brzoska, M. 2000: The regional role in post Cold-War military industrial conversion. *International Regional Science Review* 23, 3-24.
- Markusen, A. and Serfati, C. 2000: Remaking the military industrial relationship: A French-American comparison. *Defence and Peace Economics* 11, 271-299.
- Marsden, W.E. 2000: Geography and two centuries of education for peace and international understanding. *Geography* 85, 289-302.
- Marshall, D. 2004: Making sense of remembrance. *Social and Cultural Geography* 5, 37-54.
- Massabni, M. 1977: Urban contradiction and civil war: the destruction of the slum of Quarantina in Beirut. *International Journal of Urban and Regional Research* 1, 132-144.
- Massey, D., Allen, J. and Sarre, P. 1999: *Human geography today*. Cambridge: Polity.
- Marston, S. and Rouhani, F. 2001: Teaching and learning the lesson of complexity. *Arab World Geographer* 4 (2), on-line edition.
- May, E.S. 1909: *An introduction to military geography*. London: Hugh Rees.
- Mayhew, R. 2000: *Enlightenment geography: the political languages of British geography, 1650-1850*. Basingstoke: Macmillan.
- McColl, R.W. 2000: On a razor's edge: opportunity lost or opportunity gained? *Arab World Geographer* 3 (3), on-line edition.

- McColl, R.W. 2001: The law of unintended consequences: reflections on some global and national changes following the events of September 11, 2001. *Arab World Geographer* 4 (2), on-line edition.
- Melman, S. 1970: *Pentagon capitalism: The political economy of war*. New York: McGraw Hill.
- Melman, S. 1988: *The demilitarized society: Disarmament and conversion*. Montreal: Harvest House.
- Mitchell, D. 2005: You who are the bureaucrats of empire, remember who we are. *Antipode* 37, 203-207.
- Morris, M. 1997: Gardens 'For ever England': Landscape, identity and the First World War British cemeteries on the Western Front. *Ecumene* 4, 410-433.
- Murphy, A.B. 2003: Geopolitical perspectives on the Iraq war: emerging insights and remaining challenges. *Arab World Geographer* 6 (1), on-line edition.
- Mustafa, W. 2000: Al-Aqsa Intifada: why? *Arab World Geographer* 3 (3), on-line edition.
- Mustafa, D. 2005: The terrible geographicalness of terrorism: reflections of a hazards geographer. *Antipode* 37, 72-92.
- Newman, D. 2000: The symbolism of space and place amongst Israelis and Palestinians. *Arab World Geographer* 3 (3), on-line edition.
- Niedenthal, J. 2001: *For the good of mankind: A history of the people of Bikini and their islands*. Second Edition. Micronitor: Bravo Publishers.
- Nijman, J. 2001: New York city and the geopolitical transition. *Arab World Geographer* 4 (2), on-line edition.
- Nokkentved, N.S. 2004: *Desert wings: Controversy in the Idaho desert*. Washington: Washington State University Press.
- Nolte, R. 2000: Reflections of a long-time observer. *Arab World Geographer* 3 (3), on-line edition.
- Okazawa-Rey, M. 1997: Amerasian children of GI Town: A legacy of US militarism in South Korea. *Asian Journal of Women's Studies* 3, 71-102.
- O'Loughlin, J. and Anselin, L. 1992: The geography of international conflicts; theory and methods. In Ward, M.D., editor, *The new geopolitics*. Philadelphia: Gordon and Breach, 11-38.

- O'Loughlin, J. and van der Wusten, H. 1993: The political geography of war and peace. In Taylor, P.J., editor, *Political geography of the twentieth century*. London: Belhaven, 63-113.
- O'Sullivan, P. 1991: *Terrain and tactics*. New York: Greenwood Press.
- O'Sullivan, P. 2001: *The geography of war in the post Cold War world*. Lampeter, Edward Mellen.
- O'Sullivan, P. and Miller, J.W. 1983: *The geography of warfare*. London: Croom Helm.
- Ó Tuathail, G. 1996: *Critical geopolitics: The politics of writing global space*. London: Routledge.
- Ó Tuathail, G. 2003: 'Just out looking for a fight': American affect and the invasion of Iraq. *Antipode* 35, 856-870.
- Ó Tuathail, G. and Dalby, S. 1998: *Rethinking geopolitics*. London: Routledge.
- Ó Tuathail, G. and Dahlman, C. 2004: The effort to reverse ethnic cleansing in Bosnia-Herzegovina: the limits of returns. *Eurasian Geography and Economics* 45, 439-464.
- Palka, E.J. and Galgano, F.A. 2000: editors, *The scope of military geography: Across the spectrum from peacetime to war*. New York: McGraw Hill.
- Palka, E.J. 2004a: editor, *Afghanistan: Geographic perspectives*. New York: McGraw Hill.
- Palka, E.J. 2004b: editor, *North Korea: Geographic perspectives*. New York: McGraw Hill.
- Palka, E.J. 2004c: Military Geography. In Gaile G.L. and Willmott, C.J., editors, *Geography in America at the dawn of the twenty-first century*. Oxford: Oxford University Press.
- Parai, L., Solomon, B. and Wait, T. 1996: Assessing the socio-economic impacts of military installations on their host communities. *Defence and Peace Economics* 7, 7-19.
- Parkin, S. 1997: Environmental security: issues and agenda for an incoming government. *Royal United Services Institute Journal*, June, 24-28.
- Peet, R. 2000: Commentary: celebrating 30 years of radical geography. *Environment and Planning A* 32, 951-953.
- Peltier, L.C. and Percy, G.E. 1966: *Military geography*. New Jersey: Van Nostrand.
- Pepper, D. and Jenkins, A. 1985: editors, *The geography of peace and war*. Oxford: Blackwell.

- Radcliffe, S. and Westwood, S. 1996: *Remaking the nation: Place, identity and politics in Latin America*. London: Routledge.
- Radcliffe, S. 1999: Popular and state discourses of power. In Massey, D., Allen, J. and Sarre, P., editors, *Human geography today*. Cambridge: Polity Press, 219-242.
- Reuber, P. 2003: The tale of the Just War – a post-structuralismt objection. *Arab World Geographer* 6 (1), on-line edition.
- Roberts, S., Secor, A. and Sparke, M. 2003: Neoliberal geopolitics. *Antipode* 35, 886-897.
- Robin, R. 2001: *The making of the Cold War enemy: Culture and politics in the military-intellectual complex*. Princeton, NJ: Princeton University Press.
- Rocamora, J. 1998: The conversion of the US Subic Naval Base in the Phillipines: political and economic consequences. In Kaldor, M., Albrecht, U. and Schméder, G., editors, *The end of military fordism: Restructuring the global military sector*. London: Pinter, 287-311.
- Roder, W. 1973: Effects of guerrilla war in Angola and Mozambique. *Antipode* 5, 14-21.
- Rogers, A. and Viles, A. 2003: editors *The student's companion to geography*, Second Edition, Oxford: Blackwell.
- Roseneil, S. 1995: *Disarming patriarchy: Feminism and political action at Greenham*. Buckingham: Open University Press.
- Roy, A. 2003: *War talk*, Cambridge, MA: South End Press.
- Rubenson, D., Weissler, R., Wong, C. and Everson, R. 1999: *Does the Army have a national land strategy?* Santa Monica: RAND Corporation.
- Salt, A.E.W. 1925: *Military geography of the British Commonwealth*. Aldershot and London: Gale and Polden.
- Sandars, C.T. 2000: *America's overseas garrisons: The leasehold empire*. Oxford: Oxford University Press.
- Schechla, J. 2000: Putting human rights back on the map of Palestine. *Arab World Geographer* 3 (3), on-line edition.
- Sharp, J. 1990: *Europe after an American withdrawal: Economic and military issues*. Oxford: Oxford University Press.

- Shaw, M. 1991: *Post-military society: Militarism, demilitarisation and war at the end of the twentieth century*. Cambridge: Polity Press.
- Shepherd, E. and Barnes, T. 2003: *A companion to economic geography*. Oxford: Blackwell.
- Shorrocks, T. 2000: Okinawa and the US military in Northeast Asia. *Foreign Policy in Focus* 5 (22), on-line edition.
- Shuraydi, M.A. 2003: Is devastation the price of democracy? Operation Iraqi freedom. *Arab World Geographer* 6 (1), on-line edition.
- Sidaway, J.D. 2003: Decentring political geographies. *Arab World Geographer* 6 (1), on-line edition.
- Singer, P.W. 2004: *Corporate warriors: The rise of the privatized military industry*. Ithaca: Cornell University Press.
- Smallman-Raynor, M. and Cliff, A. 2004: *War epidemics: An historical geography of infectious diseases in military conflict and civil strife, 1850-2000*. Oxford: Oxford University Press.
- Smith, G. 1993: Geopolitics. In Johnston, R.J., editor, *The challenge for geography: A changing world, a changing discipline*. Oxford: Blackwell, 76-99.
- Smith, D. and Smith, R. 1983: *The economics of militarism*. London: Pluto.
- Smith, N. 2001: Ashes and aftermath. *Arab World Geographer* 4 (2), on-line edition.
- Smith, N. 2002: *American empire: Roosevelt's geographer and the prelude to globalization*. Berkeley: University of California Press.
- Solomon, B. 1996: The socio-economic assessment of military installations using an integer programming model. *Defence and Peace Economics* 7, 21-32.
- Sontag, S. 2003: *Regarding the pain of others*. London: Hamish Hamilton.
- Sorenson, D. 1998: *Shutting down the Cold War: The politics of military base closure*. New York: St Martin's Press.
- Stangl, P. 2003: The Soviet war memorial in Treptow, Berlin. *Geographical Review* 93, 213-236.
- Steinberg, M.K. and Taylor, M.J. 2003: Public memory and political power in Guatemala's postconflict landscape. *Geographical Review* 93, 449-468.

- Stephenson, M. 2003: editor, *Battlegrounds: Geography and the history of warfare*.  
Washington: National Geographic.
- Stewart, F. and FitzGerald, V. and associates 2001: *War and underdevelopment*. Oxford:  
Oxford University Press.
- Stoddart, D.R. 1992: The 'new geography' and the 'new Army' in England, 1899-1914.  
*Political Geography* 11, 87-99.
- Sturdevant, S.P. and Stoltzfus, B. 1993: *Let the good times roll: Prostitution and the US  
military in Asia*. New York: New Press.
- Sullivan, D. 1998: Professionalism and Australia's security intellectuals: knowledge, power,  
responsibility. *Australian Journal of Political Science* 33, 421-440.
- Taylor, P.J. 2000: Commentary: Subtleties of power. *Arab World Geographer* 3 (3), on-line  
edition.
- Thee, M. 1980: Militarism and militarisation in contemporary international relations. In  
Adbjorn, E. and Thee, M., editors, *Problems of contemporary militarism*. London:  
Croom Helm, 15-35.
- Thompson, D.M. and Grubbs, J.H. 1998: Embracing cultural geography: an Army imperative.  
*GeoJournal* 44, 35-41.
- Thornton, W. 2003: Cold War II: Islamic Terrorism as power politics. *Antipode* 35, 205-211.
- Tivers, J. 1999: 'The Home of the British Army': the iconic construction of military defence  
landscapes. *Landscape Research* 24, 303-319.
- Unwin, P.T. 1992: *The place of geography*, Harlow: Longman.
- Vagts, A. 1959: *A history of militarism: Civilian and military*. London: Hollis and Carter.
- Warf, B. 1997: The geopolitics/geoeconomics of military base closures in the USA. *Political  
Geography* 16, 541-563.
- Webster, G. 2003: Comments on war in Iraq essays. *Arab World Geographer* 6 (1), on-line  
edition.
- Westing, A. 1988: The military sector vis-a-vis the environment. *Journal of Peace Research*  
25, 257-64.

- Winters, H.A. with Galloway, G, Reynolds, W. and Rhyne, D. 1998: *Battling the elements: Weather and terrain in the conduct of war*. Baltimore: Johns Hopkins University Press.
- Wood, D. 2001: *The hidden geography of transnational surveillance: Social and technological networks around signals intelligence sites*. PhD Thesis, University of Newcastle, UK.
- Woodward, R. 1999: Gunning for rural England: The politics of the promotion of military land use in the Northumberland National Park. *Journal of Rural Studies* 15, 17-33.
- Woodward, R. 2001: Khaki conservation: an examination of military environmentalist discourses in the British Army. *Journal of Rural Studies* 17, 201-217.
- Woodward, R. 2004: *Military geographies*. Oxford: Blackwell.
- Yiftachel, Y. 2004: Contradictions and dialectics: reshaping political space in Israel/Palestine: An indirect response to Lina Jamoul. *Antipode* 36, 607-613.

---

<sup>1</sup> The definitions of militarism with which this paper works, and the geographical traditions and approaches with which this paper deals, are drawn primarily from Anglophone scholarship and speak directly to it. I make this point in recognition of the arguments of critical geography, with which I concur, about the need for geographers to be explicit about the situated nature of knowledge. My focus on Anglophone scholarship reflects the fact that this is the scholarly tradition which I know, and within which I work. I am confident about the claims I make, concerning the scope and trajectory and limits of this scholarship, because this is a context and praxis that is my own. There are different stories to tell about other approaches to military issues and military geographies, which may or may not correlate with the Anglo experience; think, for example, of French, Latin American, Arab and Israeli scholarship in this field – see Section II. That I mention, but do not explore. these in depth is not to imply that they are unimportant, or can somehow be incorporated within a set of arguments originating in Anglophone human geography. Indeed, the insights from scholarly traditions other than my own have been very useful. The point is that whilst there are certainly other stories to tell about militarism's geographies, coming from other geographical traditions, the fact remains that I am not the most appropriate person to explore them in detail.

---

<sup>2</sup> A notable exception is Cynthia Enloe's work on militarization and gender (Enloe, 1984, 2000).

<sup>3</sup> Prompted by the *Dictionary's* silences, I embarked one day on a survey of the indexes of a random collection of 'state-of-the-discipline' collections, to see whether my key words (armed, defence, military, war) figured either as index entries or as substantive sections or chapters. My survey included Johnston and Claval (1984), Gregory and Walford (1989) Gregory *et al*, (1994), Massey *et al*, (1999), Rogers and Viles (2003), Shepherd and Barnes (2003) and Cloke and Johnston (2005). My keywords were absent.

<sup>4</sup> I use upper case to distinguish Military Geography – the applied application of geographical techniques to military problems – from the less disciplined military geographies that I go on to explore in this paper.

<sup>5</sup> At the time of writing, the President of the Specialty Group is a civilian academic, an exception in a history of long military involvement.

<sup>6</sup> For a discussion of the 'military-intellectual' complex of the Cold War, specifically of social and behavioural scientists in the USA, see Robin (2001).

<sup>7</sup> For an interesting and critical discussion of a parallel situation concerning the intimacies between Australian defence and security professionals, and defence and security studies, see Sullivan (1998).

<sup>8</sup> This approach also moves on from the 'geographies of defence' suggested by Bateman and Riley's (1987) book of the same name.

<sup>9</sup> Other topics suggested by a focus on militarism's geographical constitution and expression would include, for example, the relationships between military activities and the natural environment; cartography and military power; and surveillance issues.