# Critique of Space Militarization Cases

## 1NC—Critical Astropolitics Critique

### The affirmative’s drive for space control and full-spectrum dominance reduces the world’s population to Bare Life. In the name of defending the universe, the state is permanently mobilized to achieve domination—the result is totalitarianism.

Peoples 9 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2007 ("Haunted Dreams: Critical Theory, Technology and the Militarization of Space," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

It might be wondered, however, as to why particularly we should revisit Critical Theory in light of the resurgent debate on the militarization/weaponization of space. Certainly the rhetoric surrounding both the military and non-military use of space in the case of the United States, which has tended to stimulate the greatest debate in this regard, is pervaded by the language of domination underpinned by an assumption of technological supremacy. Indeed, pace Agamben, some have gone so far as to argue that current research into space weapons that could 'target anyone, anywhere, at anytime' portends the reduction of all life to 'bare life'.5 Whether or not this assumption is backed up either by actual technological advances or funding is less easy to verify.6 But recent policy discourse surrounding US space technology is certainly replete with aspirations of 'dominance', and related concepts such as 'space control' and 'space superiority'. Representative of this is the US National Space Policy, released in August, 2006 which states that: The United States considers space capabilities – including the ground and space segments and supporting links – vital to its national interests. Consistent with this policy, the United States will: preserve its rights, capabilities, and freedom of action in space; dissuade or deter others from either impeding those rights or developing capabilities intended to do so; take those actions necessary to protect its space capabilities; respond to interference; and deny, if necessary, adversaries the use of space capabilities hostile to US national interests. (US 2006) This follows on the back of a persistent fascination with space as 'the ultimate highground' for both civil and military purposes (Wolfowitz 2002), the designation of space as within Joint Vision 2020's mandate of 'full spectrum dominance',7 the elevation of the concept of 'Space Control' ('the ability to assure access to space, freedom of operations within the space medium, and an ability to deny others the use of space, if required'8) within US air and space doctrine, as well as references by American military officials to the 'importance of dominating space in peace and war' (France 2000). The role of space surveillance and communications technologies during the Gulf War of 1991, the US-led strike on Afghanistan and the invasion of Iraq in 2003 lend substance to this stated centrality of space dominance to US military capacity. In addition the latent 'dual-use' potentialities of missile defence technologies – whether in terms of using deployed Ground-Based or Sea-Based Missile Defense as a rudimentary form of anti-satellite or ASAT weapon (as was effectively illustrated by the US in its strike against an American spy-satellite in February 2008) or the offensive potential of ostensibly defensive technologies in development such as the 'NFIRE' and Space-Based Laser (SBL) – have raised further questions about the potential use of space as a theatre of war in its own right as well as a 'force multiplier' for conventional terrestrial conflicts (DeBlois et al. 2008). Much of this current debate invites parallels with the period of the space weapons fantasies of the 1950s and 1960s and Marcuse's ensuing analysis. Certainly there are echoes of von Braun's proposed orbital bombing platforms in recent discussions of 'Long-Rod Penetrators' – satellites used to deliver projectile weapons from orbit (DeBlois et al. 2008:70). Indeed, Neufeld argues that von Braun is a 'forgotten forerunner to space power theory', most notably being the first person to use the term 'space superiority', the antecedent to today's concepts of space control and dominance, in print (Neufeld 2006:52). Likewise, Marcuse's war-gamers at RAND have their contemporary equivalent in simulations of space conflict in the '2010 and 2020 time frame' that invariably end up in escalated, even nuclear, conflict where players recommend space weaponization in the interim as a panacea (DeBlois et al. 2008:66). It would be tempting to read American space policy in this regard in terms of Marcuse's assertion that: Technological rationality reveals its political character as it becomes the great vehicle of better domination, creating a truly totalitarian universe in which society and nature, mind and body are kept in a state of permanent mobilization for the defense of this universe.9 To do so would of course be taking Marcuse's use of the term 'universe' too literally; even the 'discursive universe' surrounding American policy on space is not entirely closed, as objections to the bellicose nature of the current US stance attest to.10 At the same time, Marcuse's foreboding reading of the nature of technological development in One-Dimensional Man and elsewhere might at the very least provide a cautionary reminder of the latent negative consequences of increasing technological sophistication, most obviously in weapons of war. As in Coker's reading of Adorno cited earlier, Douglas Kellner argues that '[Marcuse] feared that more sophisticated technologies would "instrumentalize" war and produce ever more brutal forms of destruction – a vision amply confirmed in the Vietnam and Persian Gulf wars'.11 We could, arguably, easily extend this analysis to contemporary US space policy as illustrated above.

### This worldview makes the annihilation of all life inevitable.

Coviello 2k — Peter M. Coviello, Associated Professor of English at Bowdoin College, holds a Ph.D. from Cornell University, 2000 ("Apocalypse from Now On," *Queer Frontiers: Millennial Geographies, Genders, and Generations*, Edited by Joseph A. Boone et al., Published by the University of Wisconsin Press, ISBN 0299160947, p. 40-41)

Perhaps. But to claim that American culture is at present decisively postnuclear is not to say that the world we inhabit is in any way post-apocalyptic. Apocalypse, as I began by saying, *changed* – it did not go away. And here I want to hazard my second assertion: if, in the nuclear age of yesteryear, apocalypse signified an event threatening everyone and everything with (in Jacques Derrida’s suitably menacing phrase) “remainderless and a-symbolic destruction,”6 then in the postnuclear world apocalypse is an affair whose parameters are definitively *local* in shape and in substance, apocalypse is defined now by the affliction it brings *somewhere else*, always to an “other” people whose very presence might then be written as a kind of dangerous contagion, threatening the safety and the prosperity of a cherished “general population.” This fact seems to me to stand behind Susan Sontag’s incisive observation, from 1989, that, “Apocalypse is now a long-running serial: not ‘Apocalypse Now’ but ‘Apocalypse from Now On.’”7 The decisive point here in the perpetuation of the threat of apocalypse (the point Sontag goes on, at length, to miss) is that apocalypse is ever present because, as an element in a vast economy of power, it is ever useful. That is, through the perpetual threat of destruction – through the constant reproduction of the figure of apocalypse – agencies of power ensure their authority to act on and through the bodies of a particular population. No one turns this point more persuasively than Michel Foucault, who in the final chapter of his first volume of *The History of Sexuality* addresses himself to the problem of a power that is less repressive than productive, less life-threatening than, in his words, “life-administering.” Power, he contends, “exerts a positive influence on life … [and] endeavors to administer, optimize, and multiply it, subjecting it to precise controls and comprehensive regulations.” In his brief comments on what he calls “the atomic situation,” however, Foucault insists as well that the productiveness of modern power must not be mistaken for a uniform repudiation of violent or even lethal means. For as “managers of life and survival, of bodies and the race,” agencies of modern power presume to act “on the behalf of the existence of everyone.” Whatsoever might be construed as a threat to life and survival serves to authorize any expression of force, no matter how invasive or, indeed, potentially annihilating. “If genocide is indeed the dream of modern power,” Foucault writes, “this is not because of a recent return to the ancient right to kill; it is because power is situated and exercised at the level of life, the species, the race, and the large-scale phenomena of population.”8 For a state that would arm itself not with the power to kill its population, but with a more comprehensive power over the patterns and functioning of its collective life, the threat of an apocalyptic demise, nuclear or otherwise, seems a civic initiative that can scarcely be done without.

### The alternative is to reject the affirmative from our position as critical intellectuals. Resistance to space weaponization in forums like debate is key to successfully challenge the dominant discourse—our evidence is issue-specific about the role of the ballot.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

My approach to activist resistance follows much of the argument developed by Michel de Certeau on strategies and tactics, especially for a project discussed and designed in closed circles such as Space weaponization and Space warfare. De Certeau explains that agents (individual or organized) use the capital of power they accumulated through their action as and on members of society. This capitalized power is linked to a social space occupied by elites (in our case, the strategic elites), where they are able to “constitute themselves as such and from out of which they act on a social ‘exteriority’” (Feenberg, 1999: 112). This place is the elites’ if they are to formulate strategies of action: “Strategy presupposes a place that can be circumscribed as one’s own and that can serve as the base from which to direct relations with an exteriority consisting of targets and threats (clients, competitors, enemies, the countryside around the town, research goals and objects, etc.” (de Certeau, quoted in Feenberg, 1999: 112). In explaining how many social groups lack a strategic space/place that will allow them to act and that leaves them to only be able to “react ‘tactically’ to strategies they cannot escape”, de Certeau takes up the problem of resistance: Although they remain more or less within the framework of the dominant strategy, they respond to it with subtly deviant actions that alter its significance. Tactics thus differ from outright opposition in that they subvert the dominant codes from within by introducing various unexpected delays, combinations, and ironies into the application of strategies. “a thousand ways of playing/outplaying the other’s game, that is to say, the space other have instituted, characterize the subtle tenacious, resistant activity of groups which, for lack of a base, must maneuver in a network of established forces and representations” (de Certeau, quoted in Feenberg and Feenberg, 1999: 113). In my case, I use my activist role as critical scholar of IR in order to take up the US discourse of Space weaponization and for Space warfare. The intervention strategy must indeed be aimed at the tactical level as I know that I will not be able to alter the dominant strategy of the reinvigorated US war machine, with its all-too-powerful military-industrial complex and scientists involved in weaponry and warfare technology: only through tactics publicly exposing the almost secret discourse regarding Space weaponization and Space warfare can a public debate be done and hopefully citizens concerned. This is why the arguments of papers such as this one must also be presented in general public forums (in the form of op-eds, public conferences, media interventions, testimonies in public hearing commissions, etc.).

### Positioning ourselves as critical intellectuals spurs socially progressive change and prevents otherwise inevitable conflicts—the act of criticism is policy-relevant and our critique internal link turns their “cede the political” gripes.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

Using his knowledge to support the dispossessed, Etzioni was raising the whole issue of whether the United States should engage in a space race at all, given the kinds of issues with which the dispossessed and the popular classes were much more concerned. Furthermore, he spelt out alternatives to the ‘common sense’ surrounding space travel and the militarization of outer space. As he wrote: One of the major duties of university people, even if there is no consensus whatsoever among them, is to keep raising issues – such as the value of fallout shelters, or the logic of sending a man to the Moon, or the logic of deterrence – thereby extending the public debate to include new alternatives. (Etzioni 1964: 64, original emphasis) Etzioni’s study, in short, certainly did not claim to be ‘objective’. It was an explanation of reality that was demonstrating that alternatives were possible. In this book we have aimed to go even further towards revealing ‘the worm in the apple’ of space humanization: outlining the capital processes which underpin it and in the process stripping away some of the hegemonic assumptions that serve to obscure them. This is what Roy Bhaskar (1986) refers to as an explanatory critique: the deliberate undermining of the false beliefs created by society based on social power and coercion. An explanatory critique exposes the causal mechanisms and elements that underlie the complexity of the social life and of the universe. Moreover, it exposes the ways in which these mechanisms are used by the powerful as a means of enhancing their authority over the rest of society. The science of outer space is now being deployed to humanize the cosmos in ways that not only reproduce the social order, but extend this order indefinitely into the cosmos. But an explanatory critique hopefully also shows that there is nothing inevitable about this process. Social and political alliances can be, and are being, forged against this particular form of humanization. New types of common sense can be constructed. Contemporary forms of subjectivity which are alienated from the cosmos and dreaming about being part of it are not inevitable. They are the product of recent times and can certainly undergo change in a more socially progressive direction.

# ---- Link Materials

## Link—Space Weaponization

### Space weapons are the ultimate form of imperialism—the impact is genocidal violence.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

This process of primitive accumulation is of importance to our concerns in two ways. First, the doctrine of space control represents the extension of U.S. sovereignty into outer space. In addition to being a clear violation of international law, it reinforces the constitutive effect identified in the previous section on missile defense, namely to re- inscribe the “hard shell” borders of the U.S., which are now extended to include the “territory” of outer space. This simultaneously constitutes the exclusive sovereignty of the U.S., while displacing the sovereignty of other states. Second, space control bears significantly on the production of political subjectivities. The original Star Trek series would begin with the voice of Captain Kirk describing space as the “final frontier”. While presenting the exploration of space as a largely peaceful enterprise, the TV show was also drawing upon its viewers’ “memories” of the “western frontier” of 19 th century U.S. expansion. At least since the writings of Frederick Turner, there has been the notion that the frontier represents the well-spring of U.S. ingenuity, freedom, and creativity. According to Turner, because as they expanded westward settlers in the U.S. had to continually adapt to a new environment, they became increasingly “American”. The theme of the frontier as essential for American identity has had a significant discursive role in U.S. imperialist expansion (Turner, 1962). Although Turner concluded that the American frontier had closed by the late 1890s, many Americans, most notably Theodore Roosevelt, concluded at just that time that in order to maintain the exceptional American identity new frontiers had to be opened overseas. The notion of frontiers, then, has been integral to the U.S. imperialist project since its outset. The doctrine of space control, seen in this light, is simply an extension of the imperial logic. By expanding into and taking control of the “final frontier” the U.S. is continuing to renew an exceptional—an exclusive—identity by adapting itself to the harsh realities of a new environment. So, the doctrine of space control can be read as extending U.S. sovereignty into orbit. While a clear violation of international law, this de facto expansion of U.S. sovereignty will have two effects. First, it enables a process of primitive accumulation, whereby orbital spaces around earth are removed from the commons initially established by the Outer Space Treaty, and places them under the control of the U.S. for use and perhaps even ownership by businesses sympathetic to U.S. interests. The U.S. becomes even more than it is now the state for global capitalism, the global capitalist state. Second, this doctrine of space control is part of the ongoing re-production of American subjects as “Americans”. Embedded within space control is the notion that space is a new frontier. Following the Turner thesis and Roosevelt’s doctrine of imperialist expansion, there has long been a drive for Americans to seek out new frontiers as a way of renewing the American identity and promoting American values of individuality, innovation, and exceptionalism. In what kind of military operations, then, would space-based weapons be primarily useful? Military policy analysts have speculated on just such questions of the political utility of these weapons. Alternatively, a space weapon might be the weapon of choice for an otherwise lower-value target if the space weapon were the only choice available in time, particularly for a time critical political effect. For example, a locomotive might not be worth a space-delivered smart munition. However, it might be well worth the use of a space-delivered smart munition to target a locomotive pulling a train full of people forced from their homes for transport to the border or to a concentration camp at the beginning of an ethnic cleansing campaign – particularly if aircraft and helicopters cannot reach the train because air defenses have not been suppressed, basing and overflight rights have not been granted, or coalition consensus on the action has not been reached (Preston et al., 2002: 56, emphasis added). This scenario is fascinating for the political logic at work within it—space weapons are required to launch an attack at an otherwise inaccessible target. The three reasons that the target might be inaccessible all have to do with potential gaps in imperial power. Either the defenses of the target country have not been suppressed, or other states have not consented to let the forces fly through their airspace, or other coalition members— presumably in NATO or the UN—have not consented to the action. The first “justification” for the use of the weapon involves clear erasure of the sovereignty of the targeted state, as it eliminates any pretense of that country’s defensibility. The second and third “justifications” diminish, by circumvention, the sovereignty of other states. All three buttress the exclusive capacity of the U.S. to act unilaterally in deciding the exception globally. In all three cases, the only practical use for this weapon is in an imperial project! The chief advantage of space weapons is their ability on very short notice to attack a target that is out of reach of conventional forces. What places these targets “out of reach” is the sovereignty of other states as exercised through those states’ abilities to defend their territory, control their airspace, and/or participate (jointly) in authorized decision of the (global) exception. The constitutive effect of these weapons, then, is to strip states of their sovereignty—they are constituted as subjects lacking authorization of decision, and lacking boundary effectively demarcating inside from outside. What modern sovereignty does (as identified in section I. above) is taken from them. Furthermore, given the potential targets that these weapons could destroy, and how they are used, space-based systems are most useful against small groups and individuals. While the purpose of the use of space-based weapons in the above example was to prevent genocide, the means by which this attack was carried out was essentially assassination—the assassination of those driving the vehicle to carry out the ethnic cleansing. Space-based weapons, then, are most useful at targeting individuals and groups on short notice in order to achieve a political objective.

### Their call to weaponize space is inextricably bound up in a discourse of danger—entrenches fear and insecurity.

Grondin 9 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2009 ("The (power) politics of Space: The US astropolitical discourse of global dominance in the War on Terror," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

This brings me to discuss the (re)territorialization of outer space as an American space. This deterritorialization and reterritorialization are linked to the War on Terror, especially because of the protection of information, the detection, and the surveillance activities of the US, which are central in "hunting down" terrorists. The militarized securitization of the orbital space by the US comes along a technological matrix that also seeks the territorialization of Space. This illustrates another manifestation of the US acting more and more as a "global security state" when acting for its national security .Within the context of the War on Terror, where US strategic discourse sees a global terrorist threat as being ever possible, it thus seems that there can be no exception for Space as an American space. It is even done preventively as a secured Space while Others do not exist yet in Space (in fact, they do, as humans inhabit the International Space Station; but that's another story…). In this spatial inscription and securitization of the American identity in Space, the frontiers of the homeland are made global and are secured through a representation of dangers (with the exception of debris in Space which are not categorized as "dangers"). By focusing on the Report of the Commission to Assess United States National Security Space Management and Organization (hereafter the Space Commission Report), that is the Rumsfeld 2001 Space Commission for the Management of Space in the national security strategy, one sees the application of the same reading that would later come with the War on Terror, albeit being more easily accepted as truthful assumptions. To that effect, a terrorist group or rogue state might try to hinder US spatial assets or those of its allies on which the US depends militarily and economically. In its 2004 National Military Strategy, the US steadfastly reaffirmed its will to constitute a global information grid and achieve a full spectrum-dominance in military matters. The US therefore wants to prevent any threat in outer space and protect its spatial activities and that of its allies. In coherence with the US global strategy of neoliberal global dominance, the US Space Command's Long Range Plan asserts that part of what is driving the US military Space programme is the need and will of trying to exert a control over the process of globalization: The United States will remain a global power and exert global leadership. … The United States remains the only nation able to project power globally. … Space commerce is increasingly integral to the global economy. Military and commercial uses of Space will become vital national interests for the United States. Achieving Space superiority during conflicts will be critical to the US success on the battlefield. As a result, US strategic discourse tends to represent the US more and more as the provider of global security, and especially when one delves into the US astropolitical discourse, one ends up with a vision of the role of the US in outer space that echoes the idea of the US acting as a global security state. In that same line, the National Security Presidential Directive disclosed 6 October 2006 by the White House Office of Science and Technology revealed the new US National Space Policy devised by George W. Bush which he signed 31 August 2006. It "establishes overarching national policy that governs the conduct of U.S. space activities" and supersedes the official US national space policy dating from the Clinton administration and which was signed 14 September 1996 as the Presidential Decision Directive/NSC-49/NSTC-8, National Space Policy. It is unequivocal in how it acknowledges all preceding official documents of the Bush administration and the previous ones in regard to military space power as it puts forth, in the background section of the document, that "Freedom of action in space is as important to the United States as air power and sea power" (NSP 2006; my emphasis). It also clearly sets as basic principles, among others, that, The United States considers space capabilities – including the ground and space segments and supporting links – vital to its national interests. Consistent with this policy, the United States will: preserve its rights, capabilities, and freedom of action in space; dissuade or deter others from either impeding those rights or developing capabilities intended to do so; take those actions necessary to protect its space capabilities; respond to interference; and deny, if necessary, adversaries the use of space capabilities hostile to U.S. national interests.

## Link—Space Missile Defense

### Space Based Missile Defense eliminates the sovereignty of all other nations and expands U.S. capitalist imperialism.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

Each of the three new forms of military use of space, if brought into effect, will dramatically affect political societies on Earth. Missile defense has as its aim the creation of a shield for the territory of the U.S. (and possibly some selected allies). To the extent that it is accomplished, this would partially re-inscribe, through a truly three-dimensional shield, the borders of the United States—in Herz’s terms, its “hard shell”—and accordingly its effective sovereignty as political subject. At the same time, it would reduce or even eliminate the capacity of other political subjects to exercise an effective deterrent defense against U.S. intervention in their affairs—that is to say, it would further erode their sovereignty. [11](http://citation.allacademic.com//meta/p_mla_apa_research_citation/0/9/8/6/8/pages98680/isa06_proceeding_98680-11.html) The second type of militarization—space control—is both a form of “privatizing” the commons of outer space, and a form of military exclusion, complementary to the effort to create an exclusive territorial “hard shell” for just one state (and perhaps its “friends”) through missile defense. In the first respect, it can be understood as a type of “primitive accumulation” (Marx, 1977: 914), whereby the commons of outer space is effectively colonized and “made safe” for the capitalist interests that flow through it—primarily information services at this point in time. Here, the project of space control is constitutive of the U.S. as expressly capitalist state—sovereign subject of a particular global socio-economic order. In the second respect, that moment of constitution is conjoined with the constitution of an exclusive—a singular—sovereignty in regard to the workings of that socio-economic order through the global commons of outer space. Finally, the placing of weapons in outer space capable of targeting objects on or near the Earth’s surface creates a new form of territorial rule. Whereas modern military action has been concerned principally with occupying and controlling territory, and whereas modern sovereignty is accordingly territorially defined, this form of weaponization of space would dispense with the need for such cumbersome military practices, and the pretense of sovereign territorial authority. Instead, through increased precision in space- based weapons systems, combined with the ability to target and attack anywhere on the Earth on a very short notice—ranging from minutes to seconds depending upon the weapon system—it becomes possible to “surveil and punish” any potential enemy of such a system. 12 This is constitutive of a globally singular sovereign, capable of deciding the exception for the entirety of humanity, with no terrestrial “outside” to the scope of its sovereignty. The first instance of weaponization of space will probably be the deployment of a space- based missile defense system. Indeed, the U.S. military is already testing several prototypes of components of such a system. Two of the most notable examples of this are NFIRE (Near Field Infrared Experiment) and the MDA (Missile Defense Agency) Space Test Bed. “NFIRE … is an experimental satellite to be launched in on (sic) a rocket in 2006 that is designed to distinguish between a ballistic missile’s fiery plume and the rocket itself, according to an official at the Missile Defense Agency (MDA)” (Krebs, 2006). The MDA Space Test Bed is slated to receive funding in 2008, with the aim of integrating already existing space technologies into a system that can intercept ballistic missiles in their boost phase from outer space. (Hitchens et al., 2006: [3).](http://citation.allacademic.com//meta/p_mla_apa_research_citation/0/9/8/6/8/pages98680/isa06_proceeding_98680-12.html) [14](http://citation.allacademic.com//meta/p_mla_apa_research_citation/0/9/8/6/8/pages98680/isa06_proceeding_98680-12.html) These systems have been subject to much debate since they were first proposed during the Reagan Administration. Critics have attacked the idea of space-based missile defense on several fronts, including, as suggested above, the program’s cost and the technical feasibility of such a project, as well as the likelihood that such a system would spark new arms races, and how such weapons might increase threats to the U.S. We acknowledge the importance of this policy debate, and that it has not yet been definitively settled. But our concern in this paper is with the constitutive and socially productive effects of such a system, if it were to be successfully established. Specifically, we ask, how would such systems affect the sovereignty of the U.S. and other states? One of the consequences of such a system is that it replaces deterrence with defense. In realist literature, the sovereignty of states is often closely linked to their ability to deter enemies from attacking. During the Cold War, nuclear weapons, through their capacity to deter attack, were cited as one of the potential means by which states could protect their territorial integrity, and, in turn, their sovereignty (Jervis, 1989). More recently, Waltz (1990) has argued that the proliferation of nuclear weapons and their deterrent effects actually stabilizes international relations, making the world safer and, implicitly, strengthening the security of sovereign states. A missile defense system, developed by and operative for only one state (or that state and its allies), undermines the logic of deterrence. States lacking the missile defense system become increasingly vulnerable to (even nuclear) attack by the state that has such a system. In a fashion precisely consistent with the logic of John Herz’s predictions made in the 1950s, the “hard shell” of defensible territory is thereby lost for those states. The realist argument that has largely carried the day for the past half century in critical response to Herz—that the deterrent effect of mutual assured destruction of two states possessing nuclear weapons re- inscribes the logic of territorial state sovereignty—accordingly is brought into doubt. With the advent of exclusive missile defense, it is worth re-examining—indeed reinvigorating—Herz’s original argument, because if the U.S. were to develop a sufficiently sophisticated missile defense shield the de-territorializing effect on the sovereignty of other states would be those that he forecasted. There would be a significant twist, however, because, for the U.S., control of an effective missile defense system would markedly re-inscribe its territorial “hard shell” and its sovereignty in exclusively shielding it from the threat of (missile-based) nuclear attack by others. The sovereignty of one state is reproduced, while that of other states is eroded.

## Link—“Full-Spectrum Dominance”

### Calls for “full-spectrum dominance” entrench everyday violence—the aff militarizes inner space and psychologically organizes the population for war.

Orr 4 — Jackie Orr, Associate Professor in the Department of Sociology at Syracuse University, 2004 ("The Militarization of Inner Space," *Critical Sociology*, Volume 30, Issue 2, Spring, Available Online to Subscribing Institutions via SAGE Journals Online)

If the militarization of outer space is an essential component of Full Spectrum Dominance, and if the so-called ‘war against terrorism’ must be situated within broader U.S. ambitions for global empire,8 it is perhaps useful for today’s civilian-soldier to wonder just how wide and deep is a “full spectrum” of dominance? What borders must be crossed to fully dominate such an infinity of space? Perhaps the domination of outer space in the interests of militarized technologies and intelligence requires the militarization of a somewhat more covert spatial territory – a territory more spectral, less smoothly operationalized but no less necessary to global dominion. What happens in that elusive terrain of ‘inner space’ as outer space becomes an overt field for fully militarized command posts? Is the ‘inner’ psychic terrain of today’s U.S. civilian-soldier another battlefield on the way to full spectrum dominance of the globe? What kind of militarized infrastructure is needed ‘inside’ the soldierly civilian called upon to support the establishment of military superiority across the spectrum of spaces ‘outside’? To what extent might Full Spectrum Dominance depend intimately on commanding ‘space power’ in both outer and inner space? The psychology of the civilian-soldier, the networks of everyday emotional and perceptual relations, constitute an ‘inner space’ that is today, I suggest, one volatile site of attempted military occupation. But the occupying forces I’m concerned with here are not those of an invasive, enemy ‘other.’ Rather, a partial and urgent history of attempts by the U.S. government, media, military, and academy to enlist the psychological life of U.S. citizens as a military asset – this is the embodied story that occupies me here. The militarization of inner space, a complex, discontinuous story that nowhere crystallizes into the clear knot of conspiracy but which leaves its uneven traces throughout the scattered archives of the 20th century United States, is now as it has been before a major concern of those most responsible for the business of war. Militarization, defined by historian Michael Geyer as “the contradictory and tense social process in which civil society organizes itself for the production of violence,” constitutes at its core a border-crossing between military and civilian institutions, activities and aims (1989: 79). The militarization of inner space can be conceived, then, as the psychological organization of civil society for the production of violence, an important feature of a broader – tense and contradictory – social process. It is not my intention to reify ‘psychology’ or psychological processes as if they could be separated from social, historical, or economic contexts. Quite the contrary. By naming the constructed ‘inner space’ of psychological activities as increasingly militarized – with the events of September 11 serving as an accelerator and intensifier of processes that are by no means new – my hope is to deepen a critical sociological commitment to contesting the ‘space’ of psychology as the radically social matter of political struggle, as one radically material weapon of war. Or its refusal.

## Link—“Space Pearl Harbor”

### Their warning of a “Space Pearl Harbor” fuels militarism and securitization.

Peoples 11 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2011 ("The Securitization of Outer Space: Challenges for Arms Control," *Contemporary Security Policy*, Volume 32, Issue 1, Available Online to Subscribing Institutions via Taylor & Francis Online)

Such programmes with possible space weapons applications (beyond ground-to space ASAT capabilities) are still in their relative infancy, and the technical prospects for such technologies, as with the more exotic missile defence proposals outlined above, are far from certain.59 Yet much of the rhetoric emanating from the United States in recent years has made expansive claims to space dominance far beyond existing capabilities. In short, rather than seeking to control the means of violence in and from space, much of the military discourse on space has generally cast the United States as a trailblazer in this regard, with exotic systems cited as a necessity for future military dominance in and from space.60 Historically these claims have tended to emanate primarily from the Air Force and Air Force Space Command. In 1998, Space Command defined the control of space (‘space control’) as ‘The ability to assure access to space, freedom of operations within the space medium, and an ability to deny others use of space, if required’61, and space was also considered as part of the remit for ‘full spectrum dominance’ in Joint Vision 2020.62 Space warriors within and beyond the United States military also make frequent reference to the ‘. . .importance of dominating space in peace and war’.63 Yet, ‘The decision to weaponize space does not lie within the military (seeking short-term military advantage in support of national security) but at the higherlevel of national policy (seeking long-term national security, economic well-being, and worldwide legitimacy of US constitutional values).’64 Instances of the securitization of outer space within military circles are hardly surprising, given vested interests and the perceived utility of space support for American forces; what is more significant though is the extent to which national policy, though stopping short of explicit advocating of space weapons, has tended to similarly maintain the centrality of space for national security. 65 As Moore’s ‘biography’ of the idea of unilateral space dominance in the United States attests to, this school of thought has long held a prominent place in American strategic circles.66 Of significance, though, is the extent to which this type of thinking has migrated into official policy, portraying American access to, and dominance of, outer space as key to national survival in the process. The tenure of the George W. Bush administration in particular saw military and policy discourse move much closer in terms of goals and language used, entrenching securitization within United States space policy as a whole. In the terms used above, the views of space warriors made much greater inroads under the Bush administration, and this has had a significant bearing on how the United States has positioned itself in terms of arms control and how other states – particularly China and Russia – have subsequently defined their own positions.67 The evolution of official American discourse on outer space over the past decade attests to this subtle shift. In 2001, the Commission to Assess United States National Security Space Management and Organization (or Rumsfeld Space Commission as it is often referred to owing to Donald Rumsfeld’s position as chair) pointed out that a number of states hostile to the United States could attain ASAT capabilities, and, infamously, warned that if the United States did not secure space it would face a Space Pearl Harbor. Members of the Bush administration subsequently went on to effectively endorse the space control concept, asserting the primacy of space for security by openly linking its potential civil and military uses (and thus suggesting only a minimal distinction between the two). Then Deputy Secretary of Defense Paul Wolfowitz argued in a 2002 speech on missile defence that ‘as we look ahead we need to think about areas that would provide higher leverage. Nowhere is that more true than in space. Space offers attractive options not only for missile defense but for a broad range of interrelated civil and military missions. It truly is the ultimate highground.’68 The culmination of this line of thinking in policy terms came with the release of the National Space Policy (NSP) in August 2006, which stated that: The United States considers space capabilities – including the ground and space segments and supporting links – vital to its national interests. Consistent with this policy, the United States will: preserve its rights, capabilities, and freedom of action in space; dissuade or deter others from either those rights or developing capabilities intended to so; take those actions necessary to protect its space capabilities; respond to interference; and deny, if necessary, adversaries the use of space capabilities hostile to US national interests.69 The framing of the arguments from those within the Bush administration thus clearly aligns with the dynamics of securitization as identified by Buzan et al. The idea of a Pearl Harbor from Space invokes the nightmare scenario of a surprise attack on American interests in or from space, and was accompanied in the Rumsfeld Commission’s report by the sense of urgency characteristic of securitizing moves: ‘the present extent of US dependence on space [and] the rapid pace at which this dependence is increasing and the vulnerabilities it creates, all demand that US national security space interests be recognized as a top national security priority’.70 The Pearl Harbor analogy implied a focus on a surprise attack itself, but the rest of the report stressed the radical implications of such an attack, suggesting a potential existential threat to American commerce, society and, ultimately, way of life. As the report noted, ‘Space enters homes, businesses, schools, hospitals and government offices through its applications for transportation, health, the environment, telecommunications, education, agriculture and energy. Much like highways and airways, water lines and electric grids, services supplied from space are already an important part of the US and global infrastructures.’71 In turn, the NSP of 2006 repeated many of these same securitizing moves. It elevated national security functions of United States space policy, declaring these as vital to national interests, and national security as ‘critically dependent upon space capabilities. . . this dependence will grow.’ Similarly, the NSP described United States space systems as critical to ‘. . .a wide range of civil, commercial, and national security users’, identifying the wider security implications of space as well as its more direct military uses.72 Crucially, this securitization of space was then used to justify exceptional measures with regards to arms control and the previous era of multilateral space agreements. Among the ‘actions necessary’ to protect space capabilities the NSP declared that: The United States will oppose the development of new legal regimes or other restrictions that seek to prohibit or limit US access to or use of space. Proposed arms control agreements or restrictions must not impair the rights of the United States to conduct research, development, testing, and operations of other activities in space for US national interests.73 This sentiment had effectively been put into practice even before its formalization in the NSP 2006, with the United States abstaining from votes on the UN General Assembly PAROS (Prevention of an Arms Race in Outer Space) resolution in 2000 and an amended version in 2003, and then voting against it in 2005.74 In this sense the 2006 NSP functioned as a kind of retrospective justification of the exceptional stance adopted – on security grounds – by the Bush administration in relation to space law and arms control. In addition, and moving away from a purely textualist understanding of securitization, the destruction of the USA-193 satellite in 2008 might be seen to constitute an extra-discursive instance of securitization. Although this action was not defined explicitly in terms of a military security rationale (government agencies stressed the rationale for the shoot-down in terms of preventing the malfunctioning satellite from crashing to Earth), it left clear room for interpretation, intended or not, of American willingness to display military space capabilities and further embellished the connection between space and (military) security.75

## **Link—American Exceptionalism**

### Their call for space dominance is rooted in American Exceptionalism.

Webb 9 — Dave Webb, Professor of Engineering Modelling, Head of the Centre for Applied Research in Engineering, and Associate Director of the Praxis Centre—a multidisciplinary research centre for the 'Study of Information Technology for Peace, Conflict and Human Rights'—at Leeds Metropolitan University, holds a D.Phil. in Space Physics from the University of York, 2009 ("Space Weapons: Dream, Nightmare or Reality?," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

The US military dream of space dominance appears to have its roots in a belief that science and technology can solve all human problems – perhaps developed as part of 'The American Dream'. Since James Truslow Adams adopted the term in his 1931 book The Epic of America it has been interpreted in many different ways. To John Winthrop it was a religious paradise in a City upon a Hill, while Martin Luther King Jr. had a dream of racial equality. It is, however, usually associated with the pursuit and achievement of success through an idealistic vision of capitalism in which anyone and everyone can participate and win through by hard work and honesty. The US often portrays itself as a young, vigorous nation born from the failure of older societies to develop and accommodate change swiftly enough. US citizens are led to believe that one thing that sets them aside from others is that their country looks to the future rather than dwells in the past – progress, economic success and technological development have become synonymous. The success of the US in winning the space race has probably encouraged a belief that solutions to difficult problems can be found by supplying enough money and sufficient strength of will. If you want something strongly enough and you are prepared to pay for it then it can eventually be yours. The economic collapse of the Soviet Union has also reinforced this. The American Dream also includes a role as protectors of freedom and people's rights – perhaps emanating from its roots as a country built up from a wide-ranging mixture of immigrant groups consisting of refugees, adventurers, dissidents and asylum-seekers.

## Link—Dolman (A2: Prodicts)

### Their prodicts are a product of the neoconservative echo chamber—prefer critical interventions to right-wing back-slapping.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Two things should now be clear. First, outer space is no longer remote from our everyday lives; it is already profoundly implicated in the ordinary workings of economy and society. Secondly, the import of space to civilian, commercial and, in particular, military objectives, means there is a great deal at stake in terms of the access to and control over Earth’s orbit. One cannot overstate this last point. The next few years may prove decisive in terms of establishing a regime of space control that will have profound implications for terrestrial geopolitics. It is in this context that I want to briefly introduce the emerging field of astropolitics, defined as ‘the study of the relationship between outer space terrain and technology and the development of political and military policy and strategy’ (Dolman, 2002: 15). It is, in both theory and practice, a geopolitics of outer space. Everett Dolman is one of the pioneers of the field. An ex-CIA intelligence analyst who teaches at the US Air Force’s School of Advanced Airpower Studies, he publishes in journals that are perhaps unfamiliar to critical geographers, like the modestly titled *Small Wars and Insurgencies*. As what follows is uniformly critical of Dolman’s work, I should say that his *Astropolitik: classical geopolitics in the space age* (Dolman, 2002) is unquestionably a significant book: it has defined a now vibrant field of research and debate. *Astropolitik* draws together a vast literature on space exploration and space policy, and presents a lucid and accessible introduction to thinking strategically about space. (In the previous section I drew heavily on Dolman’s description of the astropolitical environment). My critique is not founded on scientific or technical grounds but on Dolman’s construction of a formal geopolitics designed to advance and legitimate the unilateral military conquest of space by the United States. While Dolman has many admirers among neoconservative colleagues in Washington think-tanks, critical engagements (e.g. Moore, 2003; Caracciolo, 2004) have been relatively thin on the ground. Dolman’s work is interesting for our purposes here precisely because he draw’s on geography’s back catalogue of strategic thinkers, most prominently Halford Mackinder, whose ideas gained particular prominence in America in the wake of 28the Russian *Sputnik* (Hooson, 2004: 377). But Dolman is not just re-fashioning classical geopolitics in the new garb of ‘astropolitics’; he goes further and proposes an ‘*Astropolitik’ –* ‘a simple but effective blueprint for space control’ (p. 9) – modeled on Karl Hausofer’s *Geopolitik* as much as *Realpolitik*. Showing some discomfort with the impeccably fascist pedigree of this theory, Dolman cautions against the ‘misuse’ of *Astropolitik* and argues that the term ‘is chosen as a constant reminder of that past, and as a grim warning for the future’ (Dolman, 2002: 3). At the same time, however, his book is basically a manual for achieving space dominance. Projecting Mackinder’s famous thesis on the geographical pivot of history (Mackinder, 1904) onto outer space, Dolman argues that ‘who controls the Lower Earth Orbit controls near-Earth space. Who controls near-Earth space dominates Terra [Earth]. Who dominates Terra determines the destiny of humankind’. Dolman sees the quest for space as already having followed classically Mackinderian principles (Dolman, 2002: 87). And like Mackinder before him, Dolman is writing in the service of his Empire. ‘*Astropolitik* like *Realpolitik’* he writes, ‘is hardnosed and pragmatic, it is not pretty or uplifting or a joyous sermon for the masses. But neither is it evil. Its benevolence or malevolence become apparent only as it is applied, and by whom’ (Dolman, 2002: 4). Further inspiration is drawn from Alfred Thayer Mahan, whose classic volume *The Influence of Seapower Upon History*, has been widely cited by space strategists (Mahan, 1890; Gray, 1996; see also Russell, 2006). Mahan’s discussion of the strategic value of coasts, harbours, well–worn sea paths and chokepoints has its parallel in outer space (see France, 2000). The implication of Mahan’s work, Dolman concludes, is that ‘the United States must be ready and prepared, in Mahanian scrutiny, to commit to the defense and maintenance of these assets, or relinquish them to a state willing and able to do so’ (Dolman, 2002: 37). The primary problem for those advancing *Astropolitik* is that space is not a lawless frontier. In fact the legal character of space has long been enshrined in the principles of the OST and this has, to some extent, prevented it from being subject to unbridled interstate competition. ‘While it is morally desirable to explore space in common with all peoples’ writes Dolman without conviction, ‘even the thought of doing so makes weary those who have the means’ (Dolman, 2002: 135). Thus, the veneer of transcendent humanism with regard to space gives way to brazen self-interest. Accordingly, Dolman describes the *res communis* consensus7 of the OST as ‘a tragedy’ that has removed any legal incentive for the exploitation of space (137). Only a *res nullius8* legal order could construct space as ‘proper objects for which states may compete’ (138). Under the paradigm of res nullius and Astropolitik, the moon and other celestial bodies would become potential new territory for states. And here Dolman again parallels Karl Hausofer’s Geopolitik. Just as Hausofer desired a break from the Versailles Treaty (Ó Tuathail 1996: 45), Dolman wants to see the US withdraw from the OST, making full speed ahead for the Moon (see also Hickman and Dolman, 2002). Non-space-faring developing countries need not worry about losing out, says Dolman, as they ‘would own no less of the Moon than they do now’ (140).

### Their evidence is produced by Dolman’s space minions—outsider criticism is key.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Although Dolman claims that ‘no attempt will be made to create a convincing argument that the United States has a right to domination in space’, in almost the next sentence he goes on to argue ‘that, in this case, might does make right’, ‘the persuasiveness of the case’ being ‘based on the self-interest of the state and stability of the system’ (156; my emphasis). Truly, this is Astropolitik: a veneration of the ineluctable logic of power and the permanent rightness of those who wield it. And if it sounds chillingly familiar, Dolman hopes to reassure us with his belief that ‘the US form of liberal democracy ... is admirable and socially encompassing’ (156) and it is ‘the most benign state that has ever attempted hegemony over the greater part of the world’ (158). His sunny view that the United States is ‘willing to extend legal and political equality to all’ sits awkwardly with the current suspension of the rule of law in Guantanamo Bay as well as in various other ‘spaces of exception’ (see Gregory, 2004; Agamben, 2005). Dolman’s astropolitical project is by no means exceptional. The journal Astropolitics, of which he is a founding editor, contains numerous papers expressing similar views. And it is easy, I think, for critical geographers to feel so secure in the intellectual and political purchase of Ó Tuathailian critiques (Ó Tuathail, 1996), that we become oblivious to the undead nature of classical geopolitics. It is comforting to think that most geography undergraduates encountering geopolitics, in the UK at least, will in all likelihood do so through the portal of critical perspectives, perhaps through the excellent work of Joanne Sharp or Klaus Dodds (Dodds, 2005; Sharp, 2005). But the legacies of Mackinder and Mahan live on, and radical critique is as urgent as ever. While this is not the place for a thoroughgoing reappraisal of astropolitics in the manner of Gearòid Ó Tuathail, a few salient points from his critique can be brought out.

# ---- Impact Materials

## Impact—Bare Life

### Space weaponization normalizes state violence and results in Bare Life.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

Each of the three forms of space weaponization has important constitutive effects on modern sovereignty, and, in turn, productive effects on political subjectivities. Exclusive missile defense constitutes a “hard shell” of sovereignty for one state, while erasing the sovereign political subject status of other states. Space control reinforces that exclusive constitution of sovereignty and its potentiality for fostering unilateral decision. It also constitutes the ‘space-controlling’ state, the U.S., as sovereign for a particular global social order, a global capitalism, and as a state populated by an exceptional people, “Americans.” Space weaponization in the form of capacities for direct force application obliterate the meaning of territorial boundaries for defense and for distinguishing an inside from an outside with respect to the scope of policing and law enforcement—that is authorized locus for deciding the exception. States, other than the exceptional “American” state, are reduced to empty shells of sovereignty, sustained, if at all, by convenient fiction—for example, as useful administrative apparatuses for the governing of locals. And their “citizens” are produced as “bare life” subject to the willingness of the global sovereign to let them live. Together, these three sets of effects constitute what we believe can appropriately be identified as late-modern empire, the political subjects of which are a global sovereign, an exceptional “nation” linked to that sovereign, a global social order normalized in terms of capitalist social relations, and “bare life” for individuals and groups globally to participate in that social order. If our argument is even half correct, the claim with which this paper began—that modes of political killing have important effects—would be an understatement!

### The militarization of space expands US sovereignty to legitimize violence—the aff reduces the world to Bare Life.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

Thus, application of force from outer space would have at least three crucially important constitutive effects. First, it would constitute the possessor of these weapons— presumably the U.S.—as the center of a globally extensive, late-modern empire[,](http://citation.allacademic.com//meta/p_mla_apa_research_citation/0/9/8/6/8/pages98680/isa06_proceeding_98680-18.html) 17 a sovereign of the globe. But this global sovereign would exercise its power in a new way. Rather than needing to control the land, sea, and airspace of all of the Earth, it could rely on space weapons—because they enable the precise application of force at any point on earth, on short notice—to control the globe. While these weapons are not particularly useful in fighting large-scale wars, or in the conquest of territory, they make such conventional uses of military power moot, in large part. There is no longer a need to exercise sovereign power through the control of territory, all one has to do is kill—or perhaps even threaten to kill—potential adversaries around the world in order to gain one’s wishes. In short, the type of power potentially wielded by such a sovereign would be far more absolute than any encountered throughout history. 18 Second, these weapons, just as space-based missile defense was seen above to do, would effectively strip states of their ability to exercise sovereignty over their territories. While de jure sovereignty may remain intact, their de facto sovereignty would be effectively erased. For decades, realist international relations scholars have promoted the idea that states secure their sovereignty through self-help (Waltz, 1979). If states lack the capacity to defend themselves from adversaries they are particularly vulnerable to attack and conquest. While other scholars from liberal and constructivist schools of thought have questioned how closely sovereignty is linked to military capability, throughout history states with disproportionate military power have repeatedly violated the sovereignty of weaker states (Krasner, 1999). While space-based weapons in and of themselves would not enable conquest of another state, they could be used very effectively to achieve precise political objectives without a credible possibility of retaliation. Imagine what impact these weapons would have on U.S. foreign policy with respect to two of its most pressing objectives at this point in time. Consider, for one, how useful such weapons might be with respect to preventing a rival state such as Iran or North Korea from acquiring nuclear weapons. While there has been speculation that the U.S. or Israel may launch air strikes against potential nuclear weapons manufacturing facilities in these countries, the logistics—getting access to airspace from neighboring countries, and the possibility of retaliation against military forces in the area—make such operations difficult to carry out. Using weapons in space to conduct such missions would avoid these logistical difficulties, thereby making them easier (and presumably more likely). The threat of using space weapons on either the manufacturing sites of weapons of mass destruction or on the political leadership of an adversary in most cases probably would be sufficient to alter the behaviour of governments. In short, if the U.S. were to deploy such weapons in space, they would likely be used to much the same effect as the gunboat diplomacy of the 19 th century. A second contemporary policy objective is to fight specific non-state actors. The *9/11 Commission Report* discussed in great detail the logistical obstacles that prevented the Clinton administration from capturing or killing Osama Bin Laden (National Commission on Terrorist Attacks upon the United States, 2004: 108-15). The primary obstacle was the difficulty in either launching cruise missiles into Afghanistan through another state’s airspace or deploying U.S. Special Forces in an area so remote from U.S. military bases. Again, had the U.S. had space-based weapons at the time, they probably would have been the weapons of choice. When combined with intelligence about the location of a potential target, they could be used to kill that target on very short notice without violating the air space of other states, or needing to have a military base nearby to offer a support role. In effect, any person or group of people anywhere on Earth could be targeted on very short notice, thereby constituting everyone everywhere as objects of the global sovereign. All would be subject to the rule of the U.S. state. The sovereignty of states would no longer be an obstacle to killing enemies, and these assassinations could be carried out rather easily without the threat of retaliation by the state whose sovereignty has been violated. The example of using space weapons to target non-state actors such as Osama Bin Laden and Al Qaeda points to a third constitutive effect of space weapons. Because these weapons could target anyone, anywhere, at anytime, everyone on the Earth is effectively reduced to “bare life” (Agamben, 1998). As Agamben demonstrates in *Homo Sacer* (1998), one of the constitutive powers of the sovereign is to determine who is outside the laws and protections of the state. While human rights regimes and the rule of law may exist under a late-modern global empire policed by space weapons, 19 the global sovereign will have the ability to decide the exception to this rule of law, and this state of exception in many cases may be exercised by the use of space weapons that constituted this sovereign in the first place.

### The impact is extinction: the biopolitical management of life in service of imperial power makes possible the extermination of everyone.

Dillon 5 — Michael Dillon, Professor of Politics at the University of Lancaster, 2005 (“Cared to Death: The Biopoliticised Time of Your Life,” *Foucault Studies*, Number 2, May, p. 43-46)

Contra Ojakangas, then, biopolitics does reclaim the death function, for a number of reasons and in a variety of changing ways. It must do so. Reclaiming the death function is integral to its logic. It also reflects the changing operational dynamics of biopolitics. In relation to biopolitical logic: "In the biopower system... killing, or the imperative to kill, is acceptable only if it results not in a victory over political adversaries, but in the elimination of the biological threat to and the improvement of the species or race."18 It is acceptable and biopolitically necessary to kill, if not necessarily in the nomological sense of being exposed to death formulated in Agamben's thesis of bare life. In relation to the operationalisation of biopolitics: if biopolitics is to promote, protect and invest life, it must engage in a continuous assay of life. This continuous biopolitical assaying of life proceeds through the epistemically driven and continuously changing interrogation of the worth and eligibility of the living across a terrain of value that is constantly changing. It is changing now, for example, in response to what the life sciences are teaching about what it is to be a living thing. It is changing as biopolitical investment analysts (politicians, risk analysts, governmental technologisers) also interrogate where the best returns on life investment happen to be located in the manifold circulation and transformation of life locally and globally. Life itself mutates in and through these very circuits, not least in relation to molecular biology and electronic communication. We can broadly interpret life science now to range from molecularised biology, through digitalization, to the new social and managerial sciences of development now prominent in the fields of global governmentality, global [end page 41] development policies, human security and even military strategic discourse including, for example, 'Operations Other than War".19

One might say in Heideggerian fashion that life is the stuff of biopolitics. In the process of reducing life to stuff, biopolitics must determine the quality of the stuff so that investment in its extraction, promotion and refinement may itself be continuously assessed. It follows that some life will be found to be worth investment, some life less worth investment, while other life may prove intractable to the powers of investment and the demands it makes on life. Here, assaying morphs into evaluating the eligibility and not simply the expected utility of life forms. Ultimately, some life may turn out to be positively inimical to the circulation of life in which this investment driven process of biopolitics continuously trades, and have to be removed from life if its antipathy to biopoliticised life cannot otherwise be adapted, corrected or contained. Behind the life-charged rhetoric of biopolitics, lies the biologisation of life to which biopolitics is committed, the violence of that biologisation and the reduction of the classical political question concerning the good life (and the good death) to that of the endlessly extendable, fit and adaptable life.20 The good life Agamben refigures in terms of the pure – he also says 'profane' but note that there is no profanity without sanctity - immanence of 'happy life'.21

At the level of its micro-practices, biopolitical techniques of rule are thus adjusting technically to changing understandings of the vital signs of life. Life Assurance provides one example. It is now beginning actuarially to accommodate the ways in which the genetic revolution impacts on the 'life' to be assured. Whereas the statistical analysis of risk populations once relied upon the behavioural techniques of probability, actuarial expertise must now adjust to what the molecular as well as the behavioural sciences now teach about the terrain of value (and risk) across which the life of recombinatory biopolitics is beginning to be distributed.22

The key point of dispute with Agamben is then ontologisation versus historicisation. In effect that dispute restages the age old dispute between the [end page 42] thinker who thinks philosophically and the thinker who thinks politically – the conflict between philosophia and politeia. As first philosopher, Agamben equates politics with thinking as such.23 I wonder whether first philosophy comes first, which is why, acknowledging the vital question of conditions of possibility, I nonetheless remain attracted to Foucault's insistence on history and the micro-practices of power relations.

The key point of dispute with Ojakangas concerns the self-immolating logic of biopolitics. "Not bare life that is exposed to an unconditional threat of death," he says in the introduction to his paper, "but the care of 'all living' is the foundation of biopower." (emphasis in the original). Ojakangas says: "Foucault's biopower has nothing to do with that [Agamben] kind of bare life." I agree. Foucault's biopolitics concerns an historically biologised life whose biologisation continues to mutate as the life sciences themselves offer changing interpretations and technical determinations of life. This biologised life of biopolitics nonetheless also raises the stake for Foucault of a life that is not a biologised life. So it does for Agamben, but differently and in a different way.24 For Foucault, the biologised life of biopolitics also raises the issue of a life threatened in supremely violent and novel ways. So it does for Agamben, but again differently and for the same complex of reasons. 25

In contesting Agamben in the ways that he does, Ojakangas marks an important difference, then, between Foucault and Agamben. That done, perhaps the difference needs however to be both marked differently and interrogated differently. I have argued that there is a certain betrayal in the way Agamben reworks Foucault. There is however much more going on in this 'betrayal' than misconstruction and misinterpretation. There is a value in it. Exploring that value requires another ethic of reading in addition to that of the exegesis required to mark it out. For Agamben's loathing of biopolitics is I think more 'true' to the burgeoning suspicion and fear that progressively marked Foucault's reflections on it than Ojakangas' account can give credit for, since he concentrates on providing the exegetical audit required to mark it out rather than evaluate it. [end page 43]

In posing an intrinsic and unique threat to life through the very ways in which it promotes, protects and invests life, 'care for all living' threatens life in its own distinctive ways. Massacres have become vital. The threshold of modernity is reached when the life of the species is wagered on its own (bio) political strategies. Biopolitics must and does recuperate the death function. It does teach us how to punish and who to kill.26

Power over life must adjudicate punishment and death as it distributes live across terrains of value that the life sciences constantly revise in the cause of life's very promotion. It has to. That is also why we now have a biopolitics gone geopolitically global in humanitarian wars of intervention and martial doctrines of virtuous war.27 Here, also, is the reason why the modernising developmental politics of biopolitics go racist: "So you can understand the importance – I almost said the vital importance – of racism to such an exercise of power."28 In racism, Foucault insists: "We are dealing with a mechanism that allows biopower to work."29 But: "The specificity of modern racism, or what gives it its specificity, is not bound up with mentalities, ideologies or the lies of power. It is bound up with the techniques of power, with the technology of power."30

In thus threatening life, biopolitics prompts a revision of the question of life and especially of the life of a politics that is not exhaustively biologised; comprehensively subject to biopolitical governance in such a way that life shows up as nothing but the material required for biopolitical governance, whether in terms posed by Foucault or Agamben. Emphasising care for all living - the promotion, protection and investment of the life of individuals and populations – elides the issue of being cared to death. Being cared to death poses the issue of the life that is presupposed, nomologically for Agamben and biologically for Foucault, in biopolitics. Each foregrounds the self-immolating logic that ineluctably applies in a politics of life that understands life biologically, in the way that Foucault documents for us, or nomologically, in the way that Agamben's bare life contends. When recalling the significance of the Christian pastorate to biopolitics, Ojakangas seems to emphasize a line of succession rather than of radical dissociation. One, moreover, which threatens to elide the intrinsic violence of biopolitics and its essential relation with correction and death. [end page 44]

Something also happens to the theos as 'care of all living' is propelled by its vocation to distribute mortality and death, newly inscribed, across the terrain of value that it remorselessly constructs for life. This re-marking of theos nonetheless also marks a kind of threshold effect or phase change. Thriving on correction and death, albeit biopolitically transfiguring them in the process through the micro-practices of its continuously changing technologies of care, biopolitics effects some curious transformation of that vexed issue of transcendence for which the theos of onto-theology once stood. As if the exclusive emphasis on life should exclude the question of the not life, of the other of life and of the beyond of living, biopolitics nonetheless finds itself ensnared at every level in precisely these issues. New, biopoliticised, vocabularies emerge to address them. Note, for example, the proliferation of ethics committees in relation to genetic science and the allied recruitment of philosophy into the task of forming a new molecular clerisy for the liturgical governance of it.31

Caring to death, reinvigorated by the emergent powers of recombination, contemporary biopolitics poses novel dangers, however, to which continental philosophy is now responding in the voice of the messianic. Despite my disputing, Agamben's figure of the Camp is no hyperbolic response then to the profundity, as well as the enormity, of the stakes now posed by contemporary biopolitics in and through the dense globally evolving web of its micro-political practices. Precisely because it is a strategically sophisticated operation of heterogeneous, plural and disseminated power relations of unrivalled virtuosity, contemporary biopolitics calls for an equally heterogeneous and disseminated but quite differently ordered virtuosity, not merely of dissent but of a positively different living of life. Betraying Foucault because I think he shares that cause with him, Agamben pushes the thinking of it into realms that confront the death of God with a re-thinking of the good in terms of the figure of 'happy life'.32 Doing so, Agamben's nomological biopolitics recalls the issue of the transcendent at work within the immanent as it contests the nomological reduction of life to bare life; a feature complementary to that of Foucault's biologised life, posing a complex of political questions about the contesting of each. This is not meant to pose some covert transcendental critique of Foucault. The whole question of the relation of transcendence and immanence is a complex one. It is being newly re-thought in the thought of the messianic, as the concept of the messianic arises differently in contemporary continental thought.33 What Agamben's nomologisation of Foucault poses is the question [end page 45] of whether or not a purely immanent critique of biopolitics is sufficient or even possible. If ultimately judged to be neither sufficient or possible, and Agamben clearly thinks both, that judgment poses the additional question of some sort of transcendence at work within the immanent. For that, here at least, we have to thank Agamben; or not, if such a question troubles and disturbs you.

## Impact—American Exceptionalism

### The impact is extinction – exceptionalism engages in an active forgetting of the horrors of past atrocities, paving the way for ever-increasing violence.

Spanos 8 — William V. Spanos, Distinguished Professor of English at Binghamton University, State University of New York, 2008 (*American Exceptionalism in the Age of Globalization: The Specter of Vietnam*, Published by SUNY Press, ISBN 0791472892, p. ix-x)

In this book I contend that the consequence of America's intervention and conduct of the war in Vietnam was the self-destruction of the ontological, cultural, and political foundations on which America had perennially justified its “benign" self-image and global practice from the time of the Puritan "errand in the wilderness." In the aftermath of the defeat of the American Goliath by a small insurgent army, the "specter" of Vietnam—by which I mean, among other things, the violence, bordering on genocide, America perpetrated against an "Other" that refused to accommodate itself to its mission in the wilderness of Vietnam—came to haunt America as a contradiction that menaced the legitimacy of its perennial self-representation as the exceptionalist and "redeemer nation." In the aftermath of the Vietnam War, the dominant culture in America (including the government, the media, Hollywood, and even educational institutions) mounted a massive campaign to "forget Vietnam." This relentless recuperative momentum to lay the ghost of that particular war culminated in the metamorphosis of an earlier general will to "heal the wound” inflicted on the American national psyche, into the "Vietnam syndrome"; that is, it transformed a healthy debate over the idea of America into a national neurosis.

This monumentalist initiative was aided by a series of historical events between 1989 and 1991 that deflected the American people's attention away from the divisive memory of the Vietnam War and were represented by the dominant culture as manifestations of the global triumph of "America": Tiananmen Square, the implosion of the Soviet Union, and the first Gulf War. This "forgetting" of the actual history of the Vietnam War, represented in this book by Graham Greene's *The Quiet American*, Philip Caputo's *A Rumor of War*, and Tim O’Brien's *Going After Cacciato* (and many other novels, memoirs, and films to which I refer parenthetically), contributed to the rise of neoconservatism and the religious right to power in the United States. And it provided the context for the renewal of America's exceptionalist errand in the global wilderness, now understood, as the conservative think tank the Project for the New American [end page ix] Century put it long before the invasion of Afghanistan and Iraq, as the preserving and perpetuation of the Pax Americana.

Whatever vestigial memory of the Vietnam War remained after this turn seemed to be decisively interred with Al Qaeda's attacks on the World Trade Center and the Pentagon on September 11, 2001. Completely immune to dissent, the confident American government, under President George W. Bush and his neoconservative intellectual deputies—and with the virtually total support of the America media—resumed its errand in the global wilderness that had been interrupted by the specter of Vietnam. Armed with a resurgence of self-righteous indignation and exceptionalist pride, the American government, indifferent to the reservations of the "Old World," unilaterally invaded Afghanistan and, then, after falsifying intelligence reports about Saddam Hussein's nuclear capability, Iraq, with the intention, so reminiscent of its (failed) attempts in Vietnam, of imposing American-style democracy on these alien cultures. The early representation by the media of the immediately successful "shock and awe" acts of arrogant violence in the name of “civilization" was euphoric. They were, it was said, compelling evidence not only of the recuperation of American consensus, but also of the rejuvenation of America's national identity.

But as immediate "victory" turned into an occupation of a world unwilling to be occupied, and the American peace into an insurgency that now verges on becoming a civil war, the specter of Vietnam, like the Hydra in the story of Hercules, began to reassert itself: the unidentifiability or invisibility of the enemy, their refusal to be answerable to the American narrative, quagmire, military victories that accomplished nothing, search and destroy missions, body counts, the alienation of allies, moral irresolution, and so on.

It is the memory of this "Vietnam”—this specter that refuses to be accommodated to the imperial exceptionalist discourse of post-Vietnam America—that my book is intended to bring back to presence. By retrieving a number of representative works that bore acute witness, even against themselves, to the singularity of a war America waged against a people seeking liberation from colonial rule and by reconstellating them into the post-9/11 occasion, such a project can contribute a new dimension not only to that shameful decade of American history, but also, and more important, to our understanding of the deeply backgrounded origins of America's “war on terror" in the aftermath of the Al Qaeda attacks. Indeed, it is my ultimate purpose in this book to provide directives for resisting an American momentum that threatens to destabilize the entire planet, if not to annihilate the human species itself, and also for rethinking the very idea of America.

## Impact—Turns Multilateralism

### The affirmative forecloses the opportunity for cosmopolitan sovereignty.

Stuart 9 — Jill Stuart, LSE Fellow in Global Politics in the Department of Government at the London School of Economics and Political Science, holds a Ph.D. from the London School of Economics, 2009 ("Unbundling sovereignty, territory and the state in outer space: two approaches," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

Cosmopolitan sovereignty captures the normative dimension of outer space politics that is overlooked by more traditional reconceptualizations of sovereignty such as regime theory. Cosmopolitan sovereignty's prescriptive approach to sovereignty usefully and unapologetically acknowledges the moral dimension to outer space activities. The explicit de-linking of the state from sovereignty unbundles the problematic relationship of sovereignty, territory and the state in outer space, in suggesting that some forms of sovereignty may have individual human beings at their centre, instead of the state. However over-emphasizing the internalization of cosmopolitanism in outer space politics can drastically detract from the role of states, realpolitik and the anarchic system structure in international relations. Although West-phalian sovereignty cannot grasp the disjuncture between states, territory and sovereignty in outer space (or indeed, the globalized world), cosmopolitan sovereignty takes a big jump towards advocating and recognizing the actual progression of law and regulation as based on the individual human actor. However in Held's work this is moderated by the concession that it may be in play with other types of sovereignty, including classical sovereignty (2002:2). A critical point in regards to the cosmopolitan sovereignty approach is that the perception of the "collectivity" and "humanity" in the discourse of outer space politics is in fact that of the dominant, most powerful forces, and that a common category of "humanity" is not possible (or at least not in the present state of affairs). Notions of cosmopolitan sovereignty could lead us to over-emphasize the significance of the sense of community based on outer space, when in reality the effect of, for example, "common heritage" resources in outer space, or the "transnational" benefits from the space station are actually to the benefit of certain elite segments of world society. In this sense, sovereignty may still become de-linked from the state, but only to be reclaimed by collectives of elites, particularly in outer space where exploitation and exploration is prohibitively expensive and hence naturally excludes the vast majority of actors. How much individual humans benefit from outer space programmes is both arguable and also as yet unclear, and will depend to a degree on exogenous and internal factors that will continue to shape the development and impact of outer space politics. The development of cosmopolitan sovereignty requires a major cognitive shift in the hearts and minds of humans, and the internalization of those shifts in social norms and principles. That shift could be grossly undermined in the future by increased weaponization of outer space, or if, for example, mining of resources becomes distributed to individual countries.

# ---- Alternative Materials

## Alternative—Extensions of 1NC Alt

### Questioning the affirmative is key to breaking down space militarization—*it is only inevitable if you think it is*—resistance allows for effective change.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

Outer Space has recently come to be considered the new or next battlefield, if not the ultimate sphere of confrontation, by the national security analysts and strategists who write the US strategic discourse. In a context where arms control regulations seem to be out of sync with a world order that allegedly sees deterrence as being a fallible and imprudent strategy, this paper reflects on the US relationship with technology and pushes for a theoretical/political activism that questions the US astropolitical discourse of space weaponization. Regarding the issue of Space weaponization, and in the context of US astropolitics, this does not mean that everything is now set once and for all. To the contrary, in a neo-Luddite spirit that also takes seriously the philosopher of science Donna Haraway’s ethic of responsibility to the technology – whereas one should take responsibility for the technologies one creates and lines with, as well as resist their authoritarian aspects – and her political activism, this paper assesses the arguments of US astropolitical strategists and asks why should space weaponry technology be developed and accepted. Assuming that Space weaponization is not inevitable, it puts forth the idea that a certain technological atheism *à la* Virilio could and should be promoted by scholars/practitioners of international security in rebuttal of Space warriors’ nightmarish vision. Hence, should we accept the US astropolitical dominant discourse of Space weaponization we would fall prey to what has been called “technopoly” by the late cultural critic Neil Postman, that is we would submit “all forms of cultural life to the sovereignty of technique and technology” (Postman 1992: 52). As Chris Hables Gray asserts: “Parts of Western culture have accepted this as a given, including the military and the majority of the businesses. To assume that technologies are inevitable is the first fallacy of technopoly. To assume that they are inevitably beneficial is the second” (Gray, 2005: 71). Using the insights of historians and theorists of technologies, more prominently Paul Virilio, as well as the intellectual underpinnings of poststructuralist IR scholarship to address the Space weaponization debate in US astropolitical discourse and criticize the logic of national security and securitization that drives US governmentality with regard to outer Space, this paper asserts that a ban on Space weaponization could still very much be put on the agenda and reveal an efficient path to “peace” in outer Space. In this paper, I am thus interested in putting forth a critique informed by an ethicopolitical commitment to global security and the analysis is intended as a critical intervention in the US strategic debate on the weaponization of outer Space1 and on its geostrategy regarding Space as a future battlefield. Eschewing strategic thinking reminiscent of Cold War bipolar structure in adopting a critical geopolitics framework, this chapter focuses on the US strategic discourse that hinders possibilities of cooperation and increases the likelihood of conflicts in Space – the US astropolitical dominant discourse2. In such discourse, geostrategy is the military thinking – and writing – of geo-politics, of how the global space is conceived in terms of military planning and mapping. I wish to contribute to a marginal yet committed resistance to the dominant discourse in US security strategy by critically reassessing the crucial role of technology in US national identity (what will be here called the “US religion of technology”), the role of technology in military strategy, and on technology as a central engine of technocratic/post-technocratic societies. As a geopolitical discourse, astropolitics is about the power politics of space. In reading American space power discourses featuring space weaponization as an integral part of a U.S. grand strategy of global dominance, this paper wishes to reflect on the “US religion of technology”. The overall objective is to create and feed a critical space of resistance to the Space weaponization and Space warfare discourse in US security strategy. To do so, one must criticize the discourse that presents the possibility of Space warfare as a normal evolution of international affairs and as the result of a rationalist logic devoid of ideology, as well as space weaponization as being inevitable. The purpose is very much to critique the discourse of security experts and to enunciate some questions that should be raised publicly.

### Unpacking the logic of space weaponization is essential to uncover alternatives to inevitable violence and war.

Bormann 6 — Natalie Bormann, Visiting Assistant Professor in The Global Security Program at the Watson Institute at Brown University, 2006 ("The Lost Dimension? A Virilian Reading Of Outer Space Weaponization," Paper Presented At The Annual Meeting Of The International Studies Association, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/7/p98677\_index.html)

How can we make sense of US Space policies? More to the point, what leads the US to move ever closer to fielding offensive and defensive weapons in Space? With a new National Space Policy Directive at the ready and plans for Space-based missile defense components firmly in place, efforts to shed light onto the condition of possibility for placing weapons in Outer Space seem ever more pressing. In seeking to come to terms with the recent push for weaponizing Space, this paper looks to explore some of the recurring spatial discourses on Space ‘warfare’ and a ‘battlefield’ in Space, as they appear to be central to the invention and imagination of Outer Space as a space in need of defense and weaponization. Interested thus in uncovering the logic of practices that give meaning to Outer Space as a ‘place of permanent crisis’, this paper turns to Paul Virilio’s theorizing on themilitary organization of space. According to Virilio, we must direct our attention to the development of new technologies -from media to space-based laser to satellite imaging - as it is these that produce modes of perception and representation, which ultimately underpins our relation to, and invention of, space and habitat. For Virilio, hence, any representation of spatiality, such as exposed in visions of a ‘Pearl Harbor’ in Space, is necessarily given a priori to it; what we ‘see’ is not spatially organized in and of itself, rather its organization is made possible through the effects of technology in its production of space (or, one reality of it) and its subsequent authorization of spatially contingent action. I argue that such connection between echnology and space is tantamount for explaining the modalities of Space policies in that any spatial production of Outer Space always-already comprises an exploration of the logic of (here: military) technology. The work of Virilio can thus open some valuable insights for understanding the weaponization of Outer Space by drawing on the, mostly overlooked, relationship and interaction of technology, spatiality and Outer Space as military space. By so doing, a Virilian reading offers not only a stringent critique of the ways in which current Space policies are rendered meaningful but it also provides us with a tool for unpacking the very spatial (re)constructions of Outer Space that are presented to us as seamless and common-sensical. Why should this matter? I can think of two reasons for a renewed interest in questioning and criticizing spatiality: First, only by uncovering the processes that lead to the creation of seeing and inventing Outer Space as a sphere of permanent crisis and its ‘in-built’ logic of the need to weaponize that sphere can we bring back the, hitherto, marginalized possibility of an alternative process of organizing Outer Space (eg. peacefully). In other words, it should be clear that it is the invention of Space as a space of permanent crisis which precludes the peaceful use of Space. Secondly, the interrelation of technology and space composes some pressing questions regarding morality and responsibility within the realm of weaponization. I am thinking here especially of the ‘collateral’ damage of Space debris. If sovereignty lies outwith the material or space itself - and Virilio insists, ‘sovereignty no longer resides in the territory itself, but in the control of the territory’ 4 , then how does that affect notions of responsibility for the debris ‘in that space’? Bruno Latour offers here an interesting exploration of the morality/technology nexus and centered on questions of means and ends (next paper!).

## Alternative—1NC Geopolitics

### The alternative is to reject the affirmative’s discourse of American Domination in space in favor of critical geopolitics—this is a prerequisite for successful space exploration.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Conclusions Stephen Graham, following Eyal Weizmann, has argued that geopolitics is a flat discourse (Graham, 2004: 12; Weizmann, 2002). It attends to the cartographic horizontality of terrain rather than a verticality that cuts through the urban landscape from the advantage of orbital supremacy. Just as, for Graham, a critical geopolitics must urgently consider this new axis in order to challenge the practices and assumptions of urbicide, so too – I would argue – it must lift its gaze to the politics of the overhead. Our interest in the vertical plane must extend beyond terrestrial perspectives; we must come to terms with the everyday realities of space exploration and domination as urgent subjects of critical geographical enquiry. A prerequisite for this agenda is to overcome our sense of the absurdity and oddity of space, an ambivalence that has not served human geography well. The most obvious entry point is to think systematically about some of the more concrete expressions of outer space in the making of Earthly geographies. For instance, many of the high profile critical commentaries on the recent war in Iraq, even those written from geographical perspectives, have been slow to address the orbital aspects of military supremacy (see for instance, Harvey, 2003; Gregory, 2004; Retort, 2005). Suffice to say that, in war as in peace, space matters on the ground, if indeed the terrestrial and the celestial can be sensibly individuated in this way. There is also, I think, scope for a wider agenda on the translation of particular Earthly historical geographies into space, just as there was a translation of early occidental geographies onto imperial spaces. When Donald Rumsfeld talks of a ‘Space Pearl Harbor’, there is plainly a particular set of historico–geographical imaginaries at work that give precedence, in this case, to American experience. Rumsfeld has not been slow to invoke Pearl Harbour, most famously in the aftermath of September 11; notably, in all these examples – Hawaii in 1941; New York in 2001; and the contemporary space race – there lurks the suggestion of a threat from the East9. All of this is a reminder that the colonisation of space, rather than being a decisive and transcendent break from the past, is merely an extension of longstanding regimes of power. As Peter Redfield succinctly observed, to move into space is ‘a form of return’: it represents ‘a passage forward through the very pasts we might think we are leaving behind’ (Redfield, 2002: 814). All of this supports the idea that space is part and parcel of the Earth’s geography (Cosgrove, 2004: 222). We can conceive of the human geography of space as being, in the words of Doreen Massey, ‘the sum of relations, connections, embodiments and practices’ (Massey, 2005: 8). She goes on to say that ‘these things are utterly everyday and grounded, at the same time as they may, when linked together, go around the world’. To this we might add that they go around and beyond the world. The ‘space’ of space is both terrestrial and extra- terrestrial: it is the relation of the Earth to its firmament. Lisa Parks and Ursula Biemann have described our relationship with orbits as being ‘about uplinking and downlinking, [the] translation [of] signals, making exchanges with others and positioning the self’ (Parks and Biemann, 2o03). It is precisely this relational conception of space that might helpfully animate a revised geographical understanding of the Outer Earth. As has already been made clear, this sort of project is by no means new. Just as astropolitics situates itself within a Mackinderian geographical tradition, so a critical geography of outer space can draw on geography’s early modern cosmographical origins, as well as on more recent emancipatory perspectives that might interrogate the workings of race, class, gender and imperialism. Space is already being produced in and through Earthly regimes of power in ways that undoubtedly threaten justice and democracy. A critical geography of space, then, is not some far-fetched or indulgent distraction from the ‘real world’; rather, as critical geographers we need to think about the contest for outer space as being constitutive of numerous familiar operations, not only in respect of international relations and the conduct of war, but also to the basic infrastructural maintenance of the state and to the lives of its citizenry. Geography is already well placed to think about these things; there are many well worn lines of geographical critique that have their parallel in space. For instance, there are pressing ‘environmental’ questions about the pollution of Earth’s orbit with space ‘junk’, a development which is seriously compromising the sustainable use of Lower Earth Orbit. This high-speed midden, already of interest to archaeologists (see Gorman, 2005), is coming up for its fiftieth anniversary in 2007, after the launch of the Russian satellite Sputnik on the 4th October 1957. Since then, the sheer variety and number of discarded objects is remarkable. From lens caps to frozen astronaut faeces, the number of orbiting articles greater than 10cm in diameter currently being tracked is over 9000 (Brearley, 2005: 9). The ability to think critically about nature conservation and heritage policy – another aspect of the geographer’s remit – may also have an extra-terrestrial transference, as wilderness and ‘first contact’ paradigms look set to be mobilized in space (Cockell and Horneck, 2004; Rogers, 2004; Spennemann, 2004). One might further speculate that the economic geography of outer space would be a rich, if as yet undeveloped, avenue of enquiry. And a cultural and historical geography of space offers numerous flights of fancy, from questions of astronautical embodiment to the politics of planetary representation. All of this is to say that a geography of outer space should be a broad undertaking, aside from the obvious project of a critical geo/astropolitics. Lastly, a critical geography must not be overly pessimistic, nor must it relinquish an engagement with space technology on the grounds that this has, to date, been driven largely by military agendas. The means of our critique may require us to adopt such technologies, or, at least to ask what opportunities they present for radical praxis. One thinks here of various forms of playful and subversive activism, experiment and art-event that have deliberately toyed with space hardware (Triscott and la Frenais, 2005; Spacearts, 2006). GPS receivers can help us think reflexively about position (Parks 2001); remote sensing can be used to explore political conditions in the world (Parks and Biemann, 2o03); amateur radio-telescopy can help us re-conceptualize space by attuning us to the sonorous qualities of its scientific ‘data’ (Radioqualia, 2003); even rocket science can still carry utopian freight (Chalcraft, 2006). Through such means, can space be given a truly human geography.

## Alternative—1NC Neo-Liberalism

### The alternative is to reject the affirmative’s struggle for orbital supremacy—we must analyze the power relationships that support the neo-liberal state in order to prevent their unthinking extension into space.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

For all its clunky punnage, ‘a-whereness’ nevertheless gives a name to a set of highly contingent forms of subjectivity that are worth anticipating, even if, by Thrift’s own admission, they remain necessarily speculative. Reading this body of work can induce a certain vertigo, confronting potentially precipitous shifts in human sociality. The same sensation is also induced by engagement with Paul Virilo (Virilio, 2005). But unlike Virilio, Thrift casts off any sense of foreboding (Thrift, 2005b) and instead embraces the construction of ‘new qualities’ (‘conventions, techniques, forms, genres, concepts and even ... senses’), which in turn open up new ethico–political possibilities (Thrift, 2004: 583). It is important not to jettison this openness lightly. Even so, I remain circumspect about the power relations that underwrite these emergent qualities. And I am puzzled by Thrift’s disregard of the (geo)political contexts within which these new technologies have come to prominence. A critical geography should, I think, be alert to the ways in which state and corporate power are immanent within these technologies, actively strategising new possibilities for capital accumulation and military neo-liberalism. To the extent that we can sensibly talk about ‘a- whereness’ it is surely a function of a new turn in capitalism, which has arguably expanded beyond the frame (but not the reach) of Marx and Engels when they wrote that the need for a constantly expanding market for its products chases the bourgeoisie over the whole surface of the globe. It must nestle everywhere, settle everywhere, establish connections everywhere (Marx and Engels, 1998: 39). The current struggle for orbital supremacy, as the next section will make clear, is an extension of these relations into space in order to consolidate them back on Earth. Indeed, outer space may become, to use David Harvey’s term, a ‘spatio- temporal fix’ that can respond to crises of over-accumulation (Harvey, 2003: 43). While this might seem like shorthand for the sort of Marxist critique that Thrift rejects (Amin and Thrift, 2005), it is an analysis that is also shared by the advocates of American Astropolitik, who describe space as the means by which ‘capitalism will never reach wealth saturation’ (Dolman, 2002: 175). The production of (outer) space should, I think, be understood in this wider context.

## Alternative—Questioning

### Vote negative to resist the affirmative’s technocracy—questioning those in power is key to creating change.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

When turning to US national security state technocracy applied to outer Space, it reveals as useful to go back to Paul Virilio to shed light on this problematic situation. As critic of technology, Virilio sees technical integrism as religious fundamentalism. Indeed, it is in this sense appropriate to speak of a “religion of technology”. Like Virilio, I believe we should be technological atheists, meaning applying a critical thought towards the potential negative disruptions caused by technologies. This does not mean developing a technophobic reaction, as “[t]his is not simply anti-technology. I am an amateur of technology!” (Paul Virilio, quoted in Der Derian, 1998: 20). Virilio believes that modern man killed the transcendental Judeo-Christian god to replace it by a god machine, a deus ex machina. In many respects, the US represents the apex of this. Without calling for a Luddite-inspired attitude (I am not calling for the actual destruction of machines), Virilio warns us that “[o]ne should be an atheist of technique” (Paul Virilio, quoted in Der Derian, 1998: 69). He means that one should be critical, of technique: we should “fight it without denying it” (Paul Virilio, quoted in Der Derian, 1998: 69). He knows it is difficult to really be an atheist of technique/technology, but he believes that knowing the destructive potential of technology as religion is of the utmost importance. Therefore, it is more than necessary to rethink the blurred relations of military to the civil society and to contest the rule of the military experts by resisting to the US religion of technology in outer Space in order to prevent a “Space Pearl Harbor”. To do so leads us to criticize the technocratic thinking that pervades the national security state regime and the US strategic elites’ discourse of Space weaponization under the pretense of increasing national security. Technocracy relies on centralized, expert knowledge. Critics of technocratic society like Theodore Roszak (1969) say that in a technocratic society, to make sense of life’s complexity, citizens will tend to defer to experts, to those who “know better” (Roszak, 1969: 7). During the Cold War, it was believed by supporters and critics alike that technocracy was above ideology, “that technocracy was a form of governing that moved beyond the ideological divide of the Cold War” and that “[t]echnocratic rule was simply the rational mode of governance for complex societies” (Dean, 2002: 103). Technocratic society is society sleeping, it is a depoliticized society and it is said to be a programmed society. Under the pressures of capitalist liberalism, the industrial and postindustrial societies dreamed of technocratic control, of greater management, efficiency, stability, and rationality. But societies are made of individuals and groups that are diversified and which highlight the human and social dimensions that technocracy seeks to control and make disappear. With technocratic thinking, as one finds in the US national security state, a balanced governementality of security and economy makes sure that the demands of the welfare state, military preparedness, economic efficiency, and national security imperatives are met (Dean, 2002: 103). This was another development associated with the national security state apparatus, which introduced a new governmentality of the technologies of security and economy. Jodi Dean advances that “[c]ompliance with the efficient plans of expert planners had little in common with the mythologies of frontier freedom and creative individuality that had long been part of America’s self-understanding and were crucial to the image it used to differentiate itself from communism during the Cold War. If technocracy was post-ideological, this was part of the problem: it had purchased bland efficiency and security at the cost of the American adventure, of freedom and meaning” (Dean, 2002: 103). A technocratic society, such as that represented by the US national security state, functions in such a way that many issues that are political in substance will go unchallenged because it will be stressed that they only need to be assessed by the administrative systems which will treat them in the most efficient way possible. In these cases, political questions become technical ones. This is what Jenny Edkins has described as the “depoliticization or technologization in politics” (Edkins, 1999: xi-xii). This is why Andrew Feenberg asserts that it is in the rhetoric more than in the practices that one will find a technocratic society. For instance, this is how the US government sold the Vietnam War as quick-fix problem that American ingenuity could solve by bombing villages in South Vietnam for the inhabitants to reject communism (Feenberg, 1999: 4). As is well-known, some of the harshest critiques of the ideological dimensions of technocracy came from the critical theorists of the Frankfurt school who rightly exposed how technocracy renders governing as technology and “where the technological achievements justify themselves”, of which the American space program is one fine example (Dean, 2002: 104). The idea is not to stress that with regard to outer Space, we fall prey to the perils of technocracy as described by Herbert Marcuse’s work on the one-dimensional society where people are controlled, disciplined, and transformed into docile and conformist individuals by a social matrix governing their life. This is where technology becomes ideology as part of technocratic rule and where instrumental rationality takes away possibilities of resistance or critical thought. This happens in such a way that people are “disciplined into acquiescence so great that they were unable to contest the Cold War politics that threatened global survival” (Dean, 2002: 105). This was the case with the Cold War logic of terror resulting from nuclear deterrence. Within this national security state governmental regime, technocracy has become “criminal” in the sense that it “asserts, in the name of progress and reason, that the unthinkable may become thinkable and the intolerable tolerable” (Theodore Roszak, quoted in Virilio, 1976: 24). In effect, the constant preparedness for war, deeply entranched in the US governmentality, normalizes the threat construction process and transforms it in a technological process, as if it were a social technique applying rationality and efficiency to design the best ways to cope with these “objective” threats. Imagining threats therefore deprives imagination of it subjectivity and human imagination is dehumanized, systematized, and deformed to a point that everything in the realm of reason, of reality, of progress and knowledge leads to madness (Rozsak, 1969 [1974]: 12). This is why it is not the materialization of a threat that creates fear but its imagination. Virilio was thus so right when he wrote that “[f]rom the laser beam illuminating the objective the elites’ police to the laser beam destructing missiles in a star war, there is only a step, ‘one small step for man, one giant leap for mankind’, a great leap for its loss” (Virilio, 1996 [1984]: 177). This is Marcuse’s concept of mystification in action, as ideology is being embodied in the process of production itself, it is able to sell as *rational* irrationalities in action. This allows technocratic rule to legitimize actions and ideas that would be ruled out as irrational if people were able to take a step back and analyze them before complying to its rule. The success of technocracy has relied upon this mystification derived from the ideology of technocracy where you depoliticize the mass public through the enforcement of the rational and logical functioning of the technocratic order.11 This is how Cold War US civil defense programs were sold to the public. There is no doubt that during the Cold War, Americans were leveraged by their state leaders (and the rest of the world); they were never protected from risks of nuclear war. The home bunkers and civil defense measures were lures and inappropriate defenses. That is why “[p]eople have to take things into their own hands, politicize the processes of decision-making, and stop allowing scientific and technocratic imperatives to organize all social life” (Dean, 2002: 108). The Frankfurt School’s critique of technology as ideology describes how technology imposes a system of domination and Foucault’s critique of technocratic rationality works in the same way where a systemic domination subjugates subjects and knowledge. Both Marcuse and Foucault rightly held that technologies are forms of power that will build and shape life and environments. However, both positions leave us with an impossibility for human subjects to act against the system, i.e. the technologies, with an overall strategy (Feenberg, 1999: 8). What needs to be from a theorist/activist standpoint is to explore the possibilities of resistance that are open to us as human subjects, in the public sphere especially. It means we must strive to demystify the technologies with arguments that may sound anti-technological but which are political reflections on the consequences of technologies and active resistance to the dominant technical institutions of our societies, of the US society of security in this case. This constructivist view of technology thus calls for a reconceptualised politics of technology.

# ---- Blocks To Aff Responses

## **They Say: “Reps Don’t Shape Reality”**

### In the context of militarization, representations and justifications are key.

Bormann 6 — Natalie Bormann, Visiting Assistant Professor in The Global Security Program at the Watson Institute at Brown University, 2006 ("The Lost Dimension? A Virilian Reading Of Outer Space Weaponization," Paper Presented At The Annual Meeting Of The International Studies Association, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/7/p98677\_index.html)

Roger Handberg once wrote that ‘Space is first of all a place or location’ and hence, to contemplate Space simply in strategic and military terms would be disingenuous. 18 And clearly, there is no denying the centrality of spatiality and spatial narratives in the forging of a weaponization of Outer Space. The articulation of certain boundary-producing imageries in the construction of legitimacy for deploying weapons in orbit has served to create a particular understanding of that which purports a response: a perpetuate crisis and the possibility of permanent war in Outer Space. Space has become an opportunity, a new frontier of competition, a canvas whereupon the imaginary of confrontation and its corresponding strategy of deploying Space weapons can be projected. Former US Secretary of State Dean Rusk put it aptly in his reaction to US and Soviet nuclear weapons tests in Space when he warned that ‘there is an increasing danger that outer space will become man’s newest battlefield’. 19 The representation of a ‘battlefield’ in Space is contingent in our reading of key documents; 20 for instance, in 2001, the US Space Commission evoked the powerful image that the US is an ‘attractive candidate for another Pearl Harbor’ in Space, making the case that weapons in Space were needed to counter perceived US vulnerabilities in form of an attack on a virtual US territory and habitat in orbit. Further examples for the ways in which claims to spatiality are deeply implicated in the forging of US Space weaponization abound; they range from mapping Outer Space as a ‘final frontier’, the ‘ultimate high ground’, or a space that follows ‘the rules of the road’. One finds these discourses generally embedded within the logic of the our/their space nexus coupled with the attributes of defending our space versus an offending other that allow for the drawing of the boundaries around space: • In 2004, US Strategic Command contemplated that ‘the first step in Space control is identifying exactly what’s in orbit around the Earth, who it belongs to, and its mission. 21 • It further claims that Space control involves the ability to ‘ensure our use of space while denying the use to our adversaries’ 22 • The National Space Policy of 1996 proposes the need to assure that ‘hostile forces cannot prevent our use of space 23 [...] How does this matter? I want to argue that the task of uncovering these constructions of spatiality, the meaning-giving of the ‘material’ as reality, is vital for the direction Space policies have taken (and will continue to take). The construction of a space of a certain kind is what precedes its weaponization; it is what makes it common-sensical. If we assume the construction of space, as opposed to the exploration of space, then we need to ask: what has informed this process? “Space becomes critical’ – Military space and permanent war in Space ‘[War] now takes place in ‘aero-electro-magnetic space’. It is equivalent to the birth of a new type of flotilla, a home fleet, of a new type of naval power, but in orbital space!’ 24 What should be clear by now is that material space is ‘preconstructed’ (to borrow this phrase from Bourdieu). According to Virilio, it is the technical that precedes the spatial. The possibility of new military technology underpins the ways we invent and organize our environments. And it is the effects of technology which produces Outer Space and authorizes contingent action in support of weaponization. 25 The new technologies that allow us to penetrate Outer Space are producing new domains of experience and new modes of representations and perception.

## **They Say: “Securitization Can Be Positive”**

### So-called “positive” securitization slides easily into militarization—even if they’re right, we still win a big link.

Peoples 11 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2011 ("The Securitization of Outer Space: Challenges for Arms Control," *Contemporary Security Policy*, Volume 32, Issue 1, Available Online to Subscribing Institutions via Taylor & Francis Online)

From a Controlling the Means of Violence perspective, however, it may be that a thicker understanding of space security – contributing to a transformatory politics with regard to outer space – is required. Some have, for instance, suggested a consequentialist approach to securitization that distinguishes between ‘positive’ and ‘negative’ forms of securitization (and desecuritization).111 In parallel with debates on the merits and disadvantages of environmental security more generally,112 on this understanding securitization might be viewed as positive where it mobilizes more fundamental attempts to understand and control the means of violence in and from space based on greater awareness of space as an environment. In this light, it could be argued that a less anthropocentric (or, certainly, less state-centric) form of securitization, aimed at preserving space as an environment in its own right rather than simply a resource to be used for terrestrial goals, might be productively employed. In spite of his stated preference for treating use of space as a fundamentally political task, Moltz elsewhere seems to encourage this kind of positive securitization and sees it as an historical driver of previous international cooperation: ‘In space, interdependence was not a lofty, ideologically motivated goal but a practical concern brought on by environmental factors such as orbits, debris and mutual vulnerability.’113 Where securitizing moves highlight the inherent fragility of space-based assets within this environment they might be regarded as a potential supplement to controlling the means of violence in and from space, and to promoting a culture of peace based on space environmentalism rather than space militarism. In the current context of generally low global public awareness and significant apathy on the uses of outer space, securitizing moves of this kind could potentially mobilize and sensitize public opinion.114 No doubt suggestions in UN debates for a common security approach to uses of outer space agreed to by all states, as well as appeals for public declarations by space-faring nations against the use of weapons in and from space already goes some way in this direction.115 However, as illustrated in the analysis above, even the common or global nature of states’ attempts to securitize outer space regularly slide into more narrow claims that reserve rights to particular military uses of outer space. Even if these uses fall short of outright or deliberate weaponization of space, they nevertheless preserve the military utility of outer space and – in the process – its vulnerability to familiar terrestrial security dilemma dynamics of threat and defence. In this sense the key goal of a CMV approach, as distinct from existing arms control perspectives, should be to try and establish a conception of space security that goes beyond the particularism of a state and regional interests. Crucially, such a form of positive securitization would also need to engage a global audience rather than simply assuming it as a passive, acquiescent and indistinct entity as in the policy discourses discussed above. Working through the ways in which non-state and global civil society actors might identify space as a security issue that transcends and challenges military concerns, and how they might in turn mobilize a global public audience, is the biggest challenge facing a CMV approach in this regard. It is, though, also arguably the greatest hope in relation to establishing a genuine culture of peace in relation to outer space.

## They Say: “China Militarizing Now”

### China is getting weapons as a response to the U.S., not as an aggressive move—their representations make Chinese aggression inevitable.

Peoples 8 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2008 ("Assuming the Inevitable? Overcoming the Inevitability of Outer Space Weaponization and Conflict," *Contemporary Security Policy*, Volume 29, Number 3, December, Available Online to Subscribing Institutions via IngentaConnect)

Chinese military decision-makers, Ashley Tellis argues, are acutely aware of dependence of American military superiority on space systems and the degree to which such systems become an ‘Achilles’ heel’ as a result.64 Against these views, Johnson-Freese and Kulacki and Lewis tend to take less alarmist views, arguing that ‘Where Tellis and others reason that China is seeking to counter American military capabilities, Chinese interlocutors express their actions as matching those capabilities.’65 The actual placement of Chinese weapons in outer space, as opposed to the development of ground-based ASAT technologies, looks much less likely at this stage. Although the subtleties of what exactly constitutes the weaponization of space becomes an issue once again here, whether it includes such ground-ASATs and continuing questions over the dual-use capabilities of Chinese civilian space technologies, 66 there is an argument that the United States should emphasize the fact that such moves ultimately damage China’s aspirations to use space capabilities as a catalyst for its economic development (not least in the potentially disastrous creation of space debris), rather than casting China as a potential military rival in outer space.67 The motivations and intent behind the Chinese ASAT strike remain difficult to disentangle: some have argued that it was effort to simply demonstrate Chinese capabilities, others that it was an attempt to try and lever the United States into discussions on a new space weapons agreement, and still others that it represented a Chinese effort to keep pace with developments in US missile defence technology.68 Amidst such uncertainty it would be difficult to sustain an argument that American espousal of the inevitability thesis is the only motivation here; but it is entirely plausible to say that is a contributory factor. Moreover, the failure of the United States to explicitly renounce the employment of ASAT weapons in the wake of the Chinese strike – presumably to maintain its own right to employ such weapons – could be viewed as a missed opportunity.69 The ‘maximizing approach’70 to space technologies employed by the Chinese may not be the anti-militarist policy official rhetoric that official Chinese rhetoric might have us believe, but, conversely, the US tendency to view Chinese policy as inherently militaristic precludes potential avenues of cooperation with China in the non-military use of space. By doing so the US may simply serve to perpetuate the inevitability thesis uncritically where a more pro-active approach built around de-emphasizing the military uses of space and confidence-building measures might not.71

## **They Say: “Russia Militarizing Now”**

### Russia is not trying to militarize OR weaponize space—the affirmative’s representations result in massive arms races.

Peoples 8 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2008 ("Assuming the Inevitable? Overcoming the Inevitability of Outer Space Weaponization and Conflict," *Contemporary Security Policy*, Volume 29, Number 3, December, Available Online to Subscribing Institutions via IngentaConnect)

Russia, another major space-faring power with a vested interest in the issue of space weaponization, has consistently maintained its opposition to such developments. Even as the Soviet Union pursued research in the area of space weapons with several covert ground and space-based anti-satellite research programme (with which it initially experimented in the 1960s),72 it increasingly argued against the actual deployment of such weapons as the Cold War progressed.73 In particular the USSR feared the prospect that space-based elements of the American Strategic Defense Initiative (SDI) would irrevocably alter the nuclear balance, arguing in addition that Reagan’s ‘Star Wars’ constituted a form of space-weaponization in its own right. In the post-Cold War era, whilst developing a growing and highly profitable nonmilitary commercial launch sector and fostering bilateral and multilateral cooperation on several projects (most notably the International Space Station), Moscow has remained a vociferous opponent to the placing of weapons in space. As Victor Mizin notes, Russia’s Soviet-era experimentations with space weapons notwithstanding, ‘it would not be an overstatement to assert that Russia has traditionally been a major supporter of space security and arms control’.74 Igor Ivanov, then Russian foreign minister, has declared Russia to be ‘categorically against militarizing outer space’.75 Ivanov was backed in this view by then-President Putin, who accused ‘some nations’, in a thinly veiled reference to the US, of ‘seeking to untie their hands in order to take weapons to outer space, including nuclear weapons’.76 Russia has also been a leading proponent of revising the current international legal regime on outer space, calling for a moratorium on placing weapons in space, and suggesting (at the UN General Assembly in 2002) that a prohibition on weapons in outer space be tied into existing restrictions on missile proliferation. In this the United States and Russia have been increasingly at loggerheads, particularly since the revival of national missile defence in the United States in late 1990s as its own response to missile proliferation, and the forthright promotion of its superseding variant (re-branded as Ballistic Missile Defense or BMD) under the Bush administration. For many in the Russian military and defence circles BMD evokes ‘painful’ memories of Reagan’s SDI proposals, feelings made all the more vexing by the fact that Russia has little prospect of competing with the US in the arena of strategic defence due to lack of funds,77 and, more recently, by the agreements to extend America’s BMD systems to outposts in the Czech Republic and Poland. Russian concerns over the motivations behind US missile defence have always been offset by a continuing confidence that innovations in its own offensive arsenal – such as the newly developed manoeuvrable re-entry vehicle (MARV), modified TOPOL-M ICBM and Bulava series of sea-launched ballistic missiles – will still suffice to overcome the predicted capabilities of BMD.78 A more pertinent issue, from our perspective, is the perception in Moscow that BMD, irrespective of its direct effect on Russia’s strategic nuclear capability, will simply become a catalyst for space weaponization. As one Duma official commented in 2002, ‘The “rudimentary” NMD system is clearly unable to create a real threat for the Russian nuclear deterrence forces . . . But we cannot ignore the plans of the Rumsfeld team at the Pentagon to eventually move ABM components into space.’79 The lingering suspicion in Russia is that US missile defence is that BMD is not only an attempt to negate Russia’s nuclear forces, but is also a Trojan horse for space weapons (a suspicion that has likely grown with the employment of the SM3 missile, a component of sea-based missile defence, in the 2008 ASAT demonstration). Russian concern over this possibility is such that Mizin goes so far as to claim that, ‘The Russian political and military community is currently obsessed with the fear that the United States will finally proceed with massive weapons deployments in space, which Moscow would likely be unable to counter.’80 As is the case with China, such fears are fuelled by the rhetoric emanating from military circles in the United States advocating the weaponization of space: Russians are watching US military space programs very carefully and sometimes overreact in their efforts to thwart any potentially hostile developments in the strategic domain. They sincerely believe the overly enthusiastic, spacesuperiority incantations that are floated by US Air Force generals, not grasping the way the US government functions or paying attention to the fact that funding for many of these bold plans is seldom being provided by Congress. For this reason, some Russian experts in both the nongovernmental and governmental communities fall for the rhetoric of professional US space warmongers and industry lobbyists by overreacting to media-fanned stories on US plans to launch “Rods from God” bombardment systems or other Hollywood-styled, space-based kill systems. On the basis of this perception, Mizin argues, the Russians have also bought into the inevitability thesis: ‘Russians, in their typical Slavic fatalism, believe that the United States will be spurred to deploy space weapons by its perceived need for defenses to protect the US’.81 There are other signs, however, that the Russian policy discourse on outer space is highly resistant to the argument that the weaponization of space is inevitable, and is in this sense somewhat distinct from its Chinese counterpart. Moscow rejects the argument that there is a weaponization process that progresses according to a seemingly autonomous logic that will see war spread from land, sea, and air to space; instead, because of its assumption that BMD and space weapons are ultimately part of the same political process, it continually seeks to identify the US as the conscious force behind space weaponization. In 2001, Deputy Foreign Minister Georgii Mamedov declared that: Russia cannot agree with the view that ‘Star Wars’ . . . is ‘fatally unavoidable’ as the result of technological progress and the logic of the political development of the contemporary world. We are convinced that efforts at the so-called ‘weaponization’ of space are incompatible with the very essence of the concept of strategic stability . . . Military space has the right to exist only to the extent that it serves to reduce the risk of nuclear war, and helps control agreements in the sphere of disarmament.82 In consequence, Russia has pursued a ‘two-pronged’ strategy aimed at dissuading the United States from pursuing such a course or, failing that, being prepared for such an occurrence.83 The first involves continued attempts to build a multilateral campaign (including, for similar reasons, China, which also fears the consequences of BMD for its comparatively small nuclear force) for strengthening the outer space regime, most recently evidenced in the proposal of a draft treaty sponsored by Russia and China to the Geneva Conference on Disarmament on 12 February 2008. The second involves threats of what former Foreign Minister Ivanov termed as ‘adequate retaliatory measures’ should the American place weapons in space. Here Russia is at something of disadvantage due to the deterioration of its military space programme. Podvig argues that, ‘Even if the United States decided to introduce weapons in space, Russia would be unlikely to follow. Its own experience with anti-satellite programs is rather discouraging – capabilities of the system [last tested in 1982] were very limited and its use would have virtually no impact on the ability of the United States to operate its space-based systems.’84 Some institutional moves have, seemingly, been made to offset this deterioration. In 2001, Russia re-established the Military Space (voennyi kosmos) Forces as an independent branch of the Russian military and has attempted to introduced a revised concept of Air-Space Defence (ASD – Sistema Vozdushno-Komicheskoi Oborony). Though Russian ASAT capabilities are likely somewhat dilapidated and based around dated hardware, it is equally likely that Moscow could rapidly advance its ASAT capabilities (along the lines of the Chinese model) as part of an asymmetric response to American space superiority. Once again, it is not the intention to portray Russia as either entirely innocent, nor as exclusively reactive to US space policy. In fact there are genuine continued concerns about the supply of Russian space and missile technologies to other states. Yet, it seems unlikely that Russia will be the first state to travel the supposedly inevitable path of weaponizing outer space due in part to budgetary constraints. Of more concern is the fact that whilst Russian officials tend to be critical of the inevitability thesis as it is espoused in the US, they also tend to be committed to the principle that offensive measures are always unavoidably followed by consequent countermeasures designed to negate their effect, thus the prospect of competitive cycle.85 Russia’s foreign representatives, we might say, essentially use the inevitability thesis to attempt to dissuade others from – rather than predict or justify – the weaponization of space, and in the meantime, US espousal of the inevitability thesis can be used as a convenient rationale for those with a bureaucratic self-interest in Russian military modernization.86 As Foreign Minister Sergey Lavrov commented on his presentation of the February 2008 draft treaty on banning weapons in space, ‘Weapons deployment in space by one state will inevitably result in a chain reaction . . . And this in turn is fraught with a new spiral in the arms race, both in space and on the earth.’87

## **They Say: “Militarization Inevitable”**

### The alternative solves the reason why militarization is inevitable.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

1. Astrography and astropolitics, like geography and geopolitics, constitute ‘a political domination and cultural imagining of space’ (Ó Tuathail, 1996: 28). While commentators like Colin Gray have posited an ‘inescapable geography’ (e.g. ‘of course, physical geography is politically neutral’), a critical agenda conceives of geography not as a fixed substratum but as a highly social form of knowledge (Gray, 1999: 173; Ó Tuathail, 1999: 109). For geography, read ‘astrography’. We must be alert to the ‘declarative’ (‘this is how the Outer Earth is’) and ‘imperative’ (‘this is what we must do’) modes of narration that astropolitics has borrowed from its terrestrial antecedent (Ó Tuathail, 1999: 107). The models of Mackinder and Mahan that are so often applied to the space environment are not unchanging laws; on the contrary they are themselves highly political attempts to create and sustain particular strategic outcomes in specific historical circumstances. 2. Rather than actively supporting the dominant structures and mechanisms of power, a critical astropolitics must place the primacy of such forces always already in question. Critical astropolitics aims to scrutinise the power politics of the expert/think-tank/tactician as part of a wider project of deepening public debate and strengthening democratic accountability (Ó Tuathail, 1999: 108). 3. Mackinder’s ‘end of geography’ thesis held that the era of terrestrial exploration and discovery was over, leaving only the task of consolidating the world order to fit British interests (O’ Tuathail, 1996: 27). Dolman’s vision of space strategy bears striking similarities. And like Ó Tuathail’s critique of Mackinder’s imperial hubris, Astropolitik could be reasonably described as ‘triumphalism blind to its own precariousness’ (O’ Tuathail, 1996: 28). Dolman, for instance, makes little effort to conceal his tumescent patriotism, observing that ‘the United States is awash with power after its impressive victories in the 1991 Gulf War and 1999 Kosovo campaign, and stands at the forefront of history capable of presiding over the birth of a bold New World Order’. One might argue, however, that Mackinder – as the theorist of imperial decline – may in this respect be an appropriate mentor (Ó Tuathail, 1999: 112). It is important, I think, to demystify Astropolitik: there is nothing ‘inevitable’ about US dominance in space, even if the US were to pursue this imperial logic. 4. Again like Mackinder, Astropolitik mobilizes an unquestioned ethnocentrism. Implicit in this ideology is the notion that America must beat China into space because ‘they’ are not like ‘us’. ‘The most ruthlessly suitable’ candidates for space dominance, we are told – ‘the most capably endowed’ – are like those who populated America and Australia (Dolman, 2002: 27). 5. A critical astropolitics must challenge the ‘mythic’ properties of Astropolitik and disrupt its reverie for the ‘timeless insights’ of the so- called geopolitical masters. For Ó Tuathail, ‘geopolitics is mythic because it promises uncanny clarity ... in a complex world’ and is ‘fetishistically concerned with .... prophecy’ (Ó Tuathail, 1999: 113). Ó Tuathail’s critical project, by contrast, seeks to recover the political and historical contexts through which the knowledge of Mackinder and Mahan has become formalized.

Nothing is inevitable! Their discourse creates a self-fulfilling prophecy, flipping the case.

Peoples 8 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2008 ("Assuming the Inevitable? Overcoming the Inevitability of Outer Space Weaponization and Conflict," *Contemporary Security Policy*, Volume 29, Number 3, December, Available Online to Subscribing Institutions via IngentaConnect)

So, to what extent are we in, or approaching, a space security dilemma? Usually this question is fuelled by the latent dual-use capabilities of certain space technologies and the innate difficulty of ascertaining whether satellites in space or ground-based missile defences might, either now or in future, be armed purely for purely defensive or offensive intentions. Such conditions, it could be argued, render outer space conducive to the development of a classic security dilemma where, following Robert Jervis’ touchstone definition, ‘many of the means by which a state tries to increase its security decrease the security of others’, or where, according to John Herz, ‘Striving to attain security from [. . .] attack, [states] are driven to acquire more and more power in order to escape the impact of the power of others . . . Since none can ever feel entirely secure in such a world of competing units, power competition ensues, and the vicious circle of security and power accumulation is on.’88 With regard to outer space, the situation is potentially exacerbated accepting Mueller’s claim that ‘the nature of space weapons makes them far better to offensive than to defensive warfare’: they can strike quickly, but are themselves vulnerable to attack because they are difficult to conceal and travel along fixed orbits.89 Yet, even if a space security dilemma is a possibility, it is not quite yet fully ‘on’ (to use Herz’s phrase), in practice at least. Raymond Aron may have been right to claim that ‘only a revolution in the heart of man and the nature of states’ could preserve outer space from ‘military use’,90 but the issue of whether this can or will lead to outright conflict in, from or because of outer space is a separate one. At the moment, policy leads practice in this issue: although several major powers have some capacity to attack the assets of others should they choose to do so, none, the United States included, has the technology available to dominate it entirely. In such conditions, the argument that the weaponization of space and/or space conflict is inevitable is particularly dangerous and ill-advised, and policy-makers need to pay particular attention to the potential role of the inevitability thesis in the construction of the space security dilemma. For most analysts of the security dilemma, the dilemma necessarily exists as a condition of world politics that can, at least on some occasions, be prevented, mitigated or even escaped.91 No-one should doubt that the vagaries of the space militarization– weaponization debate, competition between the space powers in the commercial sector, and historical antipathies render such avoidance of a space security dilemma more difficult to attain. In addition, as many have pointed out, lack of agreement on a precise definition of space weapons and the problem of potential dual-use civilian technologies in space render the task of negotiating restrictions on the weaponization of space inherently complex.92 The problem with the inevitability thesis, however, is that it is, in its strongest variants, predicated upon a very narrow interpretation of the security dilemma in which prospects for mitigation are necessarily precluded. If something is assumed to be inevitable, then there is no incentive to try and prevent it from occurring. In fact, there might well be greater incentives to be the first to capitalize on a trend. Hence, if the inevitability thesis is accepted by policy-makers, it runs the risk of becoming a self-fulfilling prophecy. Here the United States in particular has a problem in managing its perception. Partially, this stems from the pervasive reiteration of the inevitability thesis as part of what is essentially a doctrinal debate centred largely in the American military, particularly the Air Force Space Command, which may have little resonance with actual policy or developments in American capabilities. But in part the problem is also that the actual statements of United States policy on the military use of outer space are insufficiently distanced from such debates (consciously or not). The Bush administration’s general pursuit of unchallenged military superiority, and concomitant view of all forms of arms control as a constraint on American power, is arguably not that far from those arguing that efforts to limit space weaponization will ultimately prove futile.93 As James Clay Moltz notes, ‘Current US space security strategy is based on traditional, “worst case” thinking about the intentions and plans of other states’, and hence the ‘intellectual groundwork’ for the formulation of alternatives is not being done.94 The problem is not that the 2006 NSP openly advocates the weaponization of space; the problem is that it is open to being read as such, thus fuelling the fears of others, potentially motivating their own push for space weapons, or at the very least adding rhetorical fuel to fire their arguments (as was shown in the cases of Russia and China). Paradoxically, given the abrasive, unilateralist tone of its 2006 NSP document, the United States might well have the most to lose from upping the ante in the military space arena. As Mueller notes, of all the space-faring powers the United States is best served by the status-quo.95 If, as the United States so often claims, it is dependent on its space infrastructure to maintain its military superiority, then asymmetric advances by others could ‘render its relative advantages in army, airpower and navy irrelevant’. This, it might be objected, is the core of the NSP 2006 argument; but rather than continually drawing a red circle around its Achilles’ heel, the United States would almost certainly be better served by promoting a discourse that is as unambiguously opposed to space weaponization as possible, rather than portraying itself as a ‘trailblazer’.96 Doing so has the further disadvantage of allowing other powers to cast themselves as simply countering or reacting to the belligerence of the United States, which itself glosses over the complexity of factors involved in the Chinese and Russian positions: China’s ASAT test renders its commitments to a space weapons prohibition somewhat hollow; Russia, for its part, has much to do to convince that espousals of new legal frameworks are not simply the stalling tactics of a technologically inferior revisionist power. All concerned have a vested interest in preventing the escalation of a space security dilemma as far as possible. There is, as James Clay Moltz argues, ‘a compelling logic to the exercise of military restraint by all actors in space because of their shared national interest in maintaining safe access to critical regions of space’.97 The adoption of such restraint is, however, dependent on political action by the major powers concerned, complemented by confidence-building measures and transparency. Though this requires more than simply a change in the current US position, the impending change in administration does create an opportunity for a more multilateralist approach to the issue of space weaponization. Options in this regard could include the development of a voluntary ‘Code of Conduct’ on the use of space, and/or encouraging negotiations with the other space powers on developing new restrictions on space weapons, such as those outlined in the United Nations prevention of an arms race in outer space initiative (PAROS), which the United States has until now opposed.98 Such actions would, at the very least, help re-inject a degree of political agency into a debate that, as has been shown here, is still heavily permeated by a strong element of fatalism. Renewal of efforts to limit the placement and use of weapons in outer space is unlikely to completely eradicate the espousal of the ‘inevitability thesis’ entirely, but it would help undercut the tendency to simply assume the ‘inevitable’ in relation to outer space weaponization and conflict.

### Lack of specific technology makes this argument laughable—their rhetoric is the ONLY thing that makes it inevitable.

Peoples 8 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2008 ("Assuming the Inevitable? Overcoming the Inevitability of Outer Space Weaponization and Conflict," *Contemporary Security Policy*, Volume 29, Number 3, December, Available Online to Subscribing Institutions via IngentaConnect)

The exact nature of those current American capabilities that might be defined as space weapons is difficult to ascertain, though many have pointed to the capabilities latent in technologies being developed as part of planned missile defences,32 as well as other more ambitious proposed weapons systems designed more specifically as offensive space weapons such as ‘Long-rod penetrators’/ ‘Hypervelocity rod bundles’ (tungsten rods dropped on targets from space that would theoretically use gravity as accelerant in a manner akin to a meteor), or ‘rods from God’ as they are also known.33 Development costs make it likely that these more ambitious projects will remain some way from fruition. What is of interest, though, is the extent to which the inevitability thesis might be said to have started migrating from the doctrinal debates of the US military and into the policy realm. The most prominent example here is the January 2001 Report of the Commission to Assess United States National Security Space Management and Organization, or the ‘Rumsfeld Space Commission’ as it is often colloquially referred to after its chair, then-incoming Secretary of Defense Donald Rumsfeld.34 The report became notorious primarily for its warning that the US could face a ‘Space Pearl Harbor’ should it fail to adequately prepare for attacks on US assets in outer space, and that ‘China’s military is developing methods and strategies for defeating the United States military in a high-tech and space-based future war’.35 This was in turn built upon an explicit endorsement of the inevitability of conflict in outer space: We know from history that every medium – air, land and sea – has seen conflict. Reality indicates that space will be no different. Given this virtual certainty, the US must develop the means both to deter and to defend against hostile acts in and from space. This will require superior space capabilities.36 This is not to say that United States policy has formally adopted the inevitability thesis entirely, at least in the strong forms frequently articulated by those within the military. The release of a new US National Space Policy (NSP) document in 2006 generated headlines such as ‘Space: America’s New War Zone’37 and made aggressive assertions of America’s right to ‘Develop capabilities, plans, and options to ensure freedom of action in space, and, if directed, deny such freedom of action to adversaries’.38 Even some of those in favour of greater safeguards against space weaponization have, however, argued that ‘there has been little indication up to now of a coherent plan for implementing a space war strategy’ by the Bush administration.39 The fact that some of the most ardent and influential supporters of space as the basis of a ‘full-spectrum combat command’ (such as former Secretary of Defence Rumsfeld and former Chairman of the Joint Chiefs of Staff Richard Myers) no longer hold top government positions means that the more ‘mainstream’40 advocacy of space in a combat support role looks likely to hold greater sway over the headline-grabbing minority promoting outright space weaponization. Further to this, little in the way of concrete implications has followed the NSP’s release. Indeed some observers, such as former Defence Advanced Research Projects Agency (DARPA) space expert Brigadier General Simon P.Worden, go so far as to claim that ‘Not only has there not been a space weapons push, but overall American military use of space is in sharp decline.’41 Yet in spite of a lack of apparent strategic, institutional and, perhaps most importantly, budgetary movement to substantiate the abrasive unilateralism in the NSP 2006, the document is still marked by its antipathy towards legal regimes on the use of outer space on the one hand, and on the other a residual linearity familiar from the inevitability thesis: that is, an assumed increasing dependence on space capabilities, the inevitable development of hostile capabilities as this dependence increases, and assumed progress in American space systems (both civilian and military) that will maintain American space superiority. So in a sense the NSP 2006 still ties the United States to a variation on the inevitability theme. Although the specifics are lacking, the United States is still committed to staying ahead in arena of space technology, and this could, conceivably, include technologies to ensure freedom of action in and from space. Hence, the NSP ‘could easily be read to endorse a strategy of fighting “in, from and through” space’ even if it does not explicitly articulate such a strategy.42 Part of the problem here is that NSP tends to base its assertions on assumptions about American capabilities that do not yet exist. As Mueller notes ‘It is seductively easy to speak in general and often glib terms’ when it comes to proposed space technologies, less easy to count on their eventual production or predict their actual strategic effects.43 What may become of increasing importance in the light of the NSP, though, are the earth-to-space capabilities that the United States does already possess. The February 2008 destruction of spy satellite USA-193 embellished the new stridency with official American space policy, even if, in technological terms, it did little more than confirm an already well-known capability of American missile forces.44 If anything, the USA-193 strike may well have also furthered the long-perceived connection between missile defence (the strike employed the sea-based Aegis Ballistic Missile Defence (BMD) component and its standard missile 3 (SM3)) and space warfare by illustrating concretely one dimension of its potential applications in this regard.45

Here’s more evidence that they’re wrong—no inevitable militarization.

Grondin 9 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2009 ("The (power) politics of Space: The US astropolitical discourse of global dominance in the War on Terror," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

Although there are several views in American astropolitical discourse, ranging from those that wish to see Space as a sanctuary to those that see Space weaponization as inevitable, all subscribe to a vision of the US state that dominates Space. In fact, one could say that the US astropolitical discourse is divided in two "familiar" camps in IR theory: realists and liberals. The difference really concerns the inevitability of the weaponization of Space, not the role of the US in outer space. On the one hand, there is the most pessimistic vision that sees Space as inevitably becoming a future battlefield (it is more representative of a realist vision of international politics). On the other hand, you find a more optimistic vision of liberal globalism, which sees the US dominating Space as it actually does without having to weaponize Space (the status quo). In truth, there even is a third way, which thinks it can have it both ways. This vision sustains that Space would have eventually become a battlefield. It thus advocates that the US takes the leadership in weaponizing Space, but it believes that the US can prevent other state actors from wanting to challenge it. Indeed, the idea would be that the US be the bearer of the freedom of Space – by having a strong Space arsenal – and that others could trust it because of the liberal nature of its hegemony (Dolman 2002b). This vision is that of Everett Dolman's Astropolitik, which incidentally will be used here as an exemplary case. It is best laid out in brief in this quote: The question is not how to dominate Space, whether a single member of the extant state system ought to dominate it, or whether the domination of Outer Space is even possible. … If one accepts for the moment, however, that Space can be dominated, and that the state or entity that does so will have an enormous advantage in the extension of military power on the terrestrial battlefield, among the obvious questions to emerge are: who could, who would, and who should dominate it? Here a case is made that the United States is the morally superior choice to seize and control Space, and that it should endeavour to do so as soon as possible. (Dolman 2002b: 1; original emphasis) In this Astropolitik approach, one reassesses US Space power strategy in light of US neo-liberal geopolitics, that is, of the US grand strategy that has sought to achieve global dominance from the Second World War onwards through US neo-liberal hegemony (Adas 2006; Sparke 2005; Duong 2002; Rupert 1995).

### And we’ll win an independent DA to their framing: claims of inevitability annihilate individual agency.

Bleiker 2k — Roland Bleiker, Senior Lecturer and Coordinator of the Peace and Conflict Studies Program at the University of Queensland and former Professor at the Australian National University, the Pusan National University, and the University of Tampere, 2000 (“Introduction: Writing human agency after the death of God,” *Popular Dissent, Human Agency and Global Politics*, Published by Cambridge University Press, ISBN 0511034172, p. 48-49)

The very notion of prediction does, by its own logic, annihilate human agency. To assert that international relations is a domain of political dynamics whose future should be predictable through a convincing set of theoretical propositions is to assume that the course of global politics is to a certain extent predetermined. From such a vantage-point there is no more room for interference and human agency, no more possibility for politics to overtake theory. A predictive approach thus runs the risk of ending up in a form of inquiry that imposes a static image upon a far more complex set of transversal political practices. The point of a theoretical inquiry, however, is not to ignore the constantly changing domain of international relations. Rather, the main objective must consist of facilitating an understanding [end page 48] of transversal struggles that can grapple with those moments when people walk through walls precisely when nobody expects them to do so. Prediction is a problematic assessment tool even if a theory is able to anticipate future events. Important theories, such as realist interpretations of international politics, may well predict certain events only because their theoretical premises have become so objectivised that they have started to shape decision makers and political dynamics. Dissent, in this case, is the process that reshapes these entrenched perceptions and the ensuing political practices.

## They Say: “Human Nature”

### Their description of militarization as an inevitable product of human nature enframes the world in a militaristic and violent way—this is wrong and creates a self-fulfilling prophecy.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

As with other questions, it should be noted that there were a number of respondents who chose to comment on the likelihood and practicality of placing weapons in space, rather than expressing a clear view for or against. Four people said that on technical grounds Earth-based weapons would be better. A few mentioned that the weapons could be used to blast an asteroid on course for Earth or debris floating in space rather than referring to their military potential. Nine people said they believed that the placing of weapons in space was inevitable, and one woman said she thought it was what the American space programme was leading up to. Another was not critical about this, expressing the view occasionally heard in pro-space circles that a military interest is necessary to get funding for a space programme at all [J3248]. What is particularly disturbing is that several respondents seemed to believe that the weaponization of space was inevitable given human nature. Such weaponization has been naturalized as ‘common sense’. One management consultant said it was inevitable given that humans by nature are fearful and aggressive animals. Another middle-aged man, a town planner, remarked that ‘Given man’s persistent ingenuity and determination to find new ways of killing and maiming people, I would be astonished if this didn’t happen eventually, and it’s possibly happening already’ [C3006]. The disturbing part is that these people, who were both critical of the idea themselves, accepted it as inevitable. This is the subtle, persuasive power of hegemony in practice. Even in crisis conditions of contestation, consent is won. There is a dialectic in place here as well, as the very idea of placing weapons in space feeds into a concept of human nature as aggressive and fearful, a concept which in turn weakens resistance to such an ‘inevitable’ project were it to proceed. War is no longer an occasional disturbance to an otherwise peaceful society. Rather, it has been made a permanent feature of the social order. Outbreaks of peace are made more the exception than the rule. War is both a recognition and a cause of the fact that making a hegemonic stability via the battle for hearts and minds is proving difficult. War, at least as recently waged by the US government, has now been made ‘pre-emptive’, preventing supposed future attacks rather than merely responding to hostilities. But we have insisted on a historical materialism, one focussing on capital accumulation and imperialism as underlying war. These processes are protected and enhanced on a global scale via the increasing militarization of industry combined with attempts to exert military control at a distance over the globe and nearby parts of outer space. So, in sum, what is the militarization and future weaponization of outer space actually all about? What are the implications of using satellites to acquire global panopticism? It has long been recognized that struggles over space on Earth are intimately connected to social struggles, to contests between classes and others. As we have seen, this is a central feature of Lefebvre’s work and it is taken up by Harvey in his studies of the Paris revolutions of 1848 and 1871 (1989a). Harvey invokes what he calls ‘a simple rule’ that ‘those who command space can always control the politics of place even though, and this is a vital corollary, it takes control of some place to command space in the first place’ (Harvey 1989b: 234). As President Lyndon B. Johnson argued in 1958: there is something more important than the ultimate weapon. That is the ultimate position – the position of total control over the Earth that lies somewhere out in space. That is [. . .] the distant future, though not so distant as we may have thought. Whoever gains that position gains control, total control, over Earth, for the purposes of tyranny or for the service of freedom. (cited in Air Force 2006) Sadly now, those interests monopolizing and controlling the use of outer space are those attempting to monopolize and control social relations, social processes and forms of subjectivity on Earth. It is possible to imagine the total militarization of the public sphere from space, civilians’ every move being watched and targeted. In short, the current way of humanizing outer space is again about exerting the hegemony of the powerful. Imperialist adventures abroad are, however, inherently unstable. They breed resistances. One form of resistance is localized social movements now being made international in scope (Figure 3.2). The Global Network Against Weapons and Nuclear Power in Space makes many of the key points raised in this chapter. Unlike the mass observation respondents, it certainly does not accept the humanization of outer space as inevitable. The Global Network aims not just to prevent the arms race moving into space but to demonstrate the link between this process and the protection and enhancement of private property on Earth. Domination of outer space is seen by them as no more and no less than a means towards the domination of global society by a bloc of interests. The central implication of the Global Network, though not one clearly spelt out, is that humanization of outer space is not necessarily of itself a bad thing. The question is who is doing the humanizing, and what kind of society is being reproduced into the cosmos.

## They Say: “Cedes The Political”

### Their evidence is written by neoconservative hacks—accepting their framing allows for the political to become dominated by Reaganites.

Grondin 9 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2009 ("The (power) politics of Space: The US astropolitical discourse of global dominance in the War on Terror," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

Through a genealogy of US military Space power (that is not undertaken in this chapter for obvious reasons of space), one could ascertain how and why it came about that US astropolitical discourses put forth the idea that Outer Space could, would, or should eventually become a battlespace and be weaponized. Hence, what one must acknowledge is how and why the neo-Reaganites and neo-conservative intellectuals and assertive nationalist policy-makers such as Donald Rumsfeld and other republican senators leading a charge for achieving Reagan's averted Strategic Defense Initiative (SDI) in the 1990s were able to have an imprint on the development of US Outer Space policy. As was extensively illustrated, the neo-conservative ideas were in truth well represented in the national security production of the Bush administration (Dalby 2006; Grondin 2006; Daalder and Lindsay 2005). For instance, the neo-conservative organization Project for the New American Century (PNAC), which produced its own report on Rebuilding America's Defense in 2000, felt that it served as the "blueprint" for the 2002 National Security Strategy (NSS). Regarding Space power, suffice it to say that the NSS was in tune with the Space Commission Report, the commission chaired by Donald Rumsfeld and which report came out in 2001 – of which the new NSP implements most recommendations. The conclusions and recommendations of their Rebuilding America's Defense stated that Space power would need to be a clear and fundamental national security objective of the US as "the emergence of Space as a key theater of war" would make the "control of Space … an essential element of [US] military strategy" (PNAC 2000:13, 55). For neo-conservatives, no other path than weaponization of Space was possible: "Over the longer term, maintaining control of Space will inevitably require the application of force both in Space and from Space, including but not limited to antimissile defenses and defensive systems capable of protecting US and allied satellites" (PNAC quoted in Huntley 2005:73). The decisive role played by neo-conservative ideologues and globalist nationalists in promoting Space weaponization resides in the policy-making process (Grondin 2006). In all likelihood, this is also the kind of advice the Bush administration has been listening to when one assesses the NSP. It is also important to take into account the viewpoint and strategic production of the Department of Defense and armed forces professionals. Should one take at face value the declaratory content of the most important doctrinal documents regarding the research and development of Space weapons systems, then both the weaponization of Space and a US objective of Space control are in little doubt in the long run. As Space is conceived as a common medium, the principle of the freedom of Space lasts as long as there is no will to take a step further – which is what Space warriors recommend. As they acknowledge, many reasons may motivate a state to develop "capabilities to control, if not dominate or claim ownership over, space orbits" (Lambakis 2001:86; original emphasis). To be convinced, one has only to consult the Space policy documents produced by the United States Space Command, the Vision for 2020 and the Long Range Plan, as well as the Space Commission Report and the latest NSP, which stands as the overarching guidance policy of US Space policies. All paint a picture of the militarization of Space as being the result of some kind of natural historical progression (Stares 1985) and that "the militarization of Space will necessarily entail the weaponization of Space" (Huntley 2005:70), as conflicts are said to be inscribed in human nature and that Space is conceived as only another medium. The Vision for 2020 states that, there will be a critical need to control the Space medium to ensure US dominance on future battlefields. Robust capabilities to ensure Space superiority must be developed – just as they have been for land, sea, and air. … Included in that planning should be the prospects for Space defense and even Space warfare. (USSPACECOM 1998:7) Along the same lines, the Space Commission Report says that we know from history that every medium – air, land and sea – has seen conflict. Reality indicates that Space will be no different. Given this virtual certainty, the US must develop the means both to deter and to defend against hostile acts in and from Space. This will require superior Space capabilities. (Space Commission 2001: x) Space is conceived as being "more than a place. It is a set of opportunities, a new dimension of warfare, a final frontier. … By 2025 it is very likely that Space will be to the air as air is to cavalry today" (US Air Force 2025, quoted in Huntley 2005:75). In the United States Space Command Vision for 2020, two objectives associated with Space dominance and weaponization are clearly stated: "US Space Command – dominating the Space dimension of military operations to protect US interests and investment. Integrating Space Forces into warfighting capabilities across the full spectrum of conflict" (USSPACECOM 1998:3). Then with the Space Commission Report, the US are warned of a "Space Pearl Harbor" (2001: xiii) and the recommendations are formulated in such a way that the US should embark on a Space weaponization course should national security require it. Finally, the new NSP now really sets out enforcing how Space is a vital interest for the United States and how national security Space is high among the nation's priorities (NSP 2006). This line of argument is usually linked to technological capacities. By asserting that other countries operate in Space, that conflicts are "natural" between humans – which brings the obvious "so why would it be different in Space" – technologies of power take the lead and one is left with devising what Space control strategy will be best and what one wants "to control, for how long, and for what purposes?" (Lambakis 2001:281). In a context where one portrays the situation as one where US aerospace industry is "held back" by the rest of the world only for fear of potential conflicts that will evolve into Space warfighting because of a renewed arms race (Lambakis 2001:282), theclaim to let technology drive the policy and the political is not disinterested – albeit ill-advised – and definitely not a sure bet. For Space warriors such as Dolman and Lambakis, Space weaponization then appears to be not so much related to the security issue, but more so to the maintenance of a strong defence and aerospace industry. The technological takes over as the political is eclipsed by the military professionals. For Space warriors, with 9/11 and the War on Terror, a "Space Pearl Harbor" is always possible and a logic of security – coupled with (military) technology – drives their analysis. In Lambakis' words: We should never take anything having to do with Space (especially access to Space or freedom to operate in Space) for granted, and we should never unnecessarily limit our options. Dominance provides our leadership and our commanders' options in life or death situations. To not use the best and the latest in weaponry because our enemy does not have it or because it will not allow a fair fight is foolish. Where we are not militarily dominant and take our security for granted, there we are at risk of a future "September 11". (Lambakis 2003:82) Fortunately, there is still debate going on because the policy-makers have not taken yet all the decisions and deployed all means to ensure the realization of Space weaponization (Waldrop 2005:39), though the future is not so bright. If it were left to military leaders and professionals of Space, and it is not as Roger Handberg reminds us (2004:78–88), Space weaponization would occur logically, if not naturally. When one assesses where the political leaders stand regarding this issue, what one can find out by consulting the NSS, the NMS and the NSP, one rapidly realizes that the political seems to go in the same direction as the military, even though the step towards Space weaponization is not as clearly acknowledged or enunciated as what one finds in the doctrinal documents of the US Air Force and Navy. It does however highlight that it supports such a path if it is to be essential to US national security and homeland security.

The political has already been ceded and the aff only makes it worse—the alternative is critical to reinstate it.

C.A.S.E. Collective 6 — C.A.S.E. Collective, a group of critical scholars who have authored several academic articles relating to critical approaches to security in Europe, 2006 ("Critical Approaches to Security in Europe: A Networked Manifesto," *Security Dialogue*, Volume 37, Number 4, December, Available Online to Subscribing Institutions via SAGE Journals Online)

The securitization of identity has brought home the realization that discourses (and practices) have political effects. These effects range between the ‘tactical attractions’ of securitization as attention-grabbing and the structur- ing of communities on the model of ‘political realism’ (Huysmans, 1998c; Williams, 2003). As ‘a kind of mobilization of conflictual or threatening relations, often through emergency mobilization of the state’ (Buzan, Wæver & de Wilde, 1998: 8), securitization does more than just potentially open the political scene to groups from the extreme right, for example. It entails structural effects by reconfiguring and ordering societies on the model of emergency or exception (Aradau, 2004; Behnke, 2006; Huysmans, 2004b). Securitization (Copenhagen School) and emancipation (Aberystwyth School) are two concepts that attempt to grapple with these ambiguous effects. Assecuritization is defined in opposition to normal politics, as a politics of exception or ‘abnormal politicization’ (Alker, 2005: 197), unmaking it implies a retrieval of the conditions of normal politics. Desecuritization would there- fore bring issues back to the ‘normal haggling of politics’ (Buzan, Wæver & de Wilde, 1998: 29). Although it has been suggested that the normal politics implied by the framework of securitization is that of liberal democracy (Aradau, 2004; Behnke, 1999; Huysmans, 2004b), normal politics remains undefined in the Copenhagen School framework. Attempts to theoretically unmake securitization, however, engage with a twofold understanding of normal politics: politics as normality (the objective socio-political order) and politics as normativity (theprinciples and ethical concepts that can transform the status quo). Although normative intent is implicit in any description of normality, desecuritization can be thought as politics of normality and emancipation as politics of normativity. Desecuritization can be seen as an attempt at retrieving the normality of politics. Huysmans (1998c: 576) has defined desecuritization as ‘unmak[ing] politics which identifies the community on the basis of the expectations of hostility’. The discursive construction of security frames normal politics as a political spectacle of alternative discourses. Through being located ‘within the realm of political argument and discursive legitimation, security prac- tices are thus susceptible to criticism and transformation’ (Williams, 2003: 512). The discursive construction of security allows for its parallel discursive deconstruction, and normality appears as a contested process of construc- tion/deconstruction. If desecuritization is anchored in the core of security analysis, the tension between discursive construction and the meaning of exceptional politics remains to be explored. Moreover, the role of discursive construction/deconstruction has already been subjected to intense criticism from more sociological approaches that draw attention to the ‘authority’ to speak.

## They Say: “Threats Real”

### Their enemies are socially constructed—the aff risks disaster.

Grondin 9 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2009 ("The (power) politics of Space: The US astropolitical discourse of global dominance in the War on Terror," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

In rebutting most US astropolitical discourses, I find myself at odds with the logic of national security and securitization of Space that pervades US governmentality. I do not believe that arms control is given a fair trial by its opponents or even by some of its main defenders in US astropolitical discourse. When people are certain and need enemies to develop strategy, then maybe some questions have not been raised – above all, how these "threats", "dangers" and "enemies" are socially constructed. This was one lesson to be drawn by US decision-makers from a faulty Cold War ideography and which they have so far failed to acknowledge for the War on Terror. There are "unknowns" and one cannot be sure of how the events will unfold if the US goes further along a path to Space weaponization. In any case, it becomes even more problematic when security is trumped with technology for there is no way – so it seems – to argue against the desire of global (read absolute) security, especially when it comes from the most powerful state. One is brought back to the realities of the global homeland security state. One is doomed to either accept the logic of terror – that inexorably goes with the logic of global security – or reject it. I choose the latter.

## They Say: “No Spillover”

### Securing space policy makes it a military issue—this fuels future militarization in other areas.

Peoples 10 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2010 ("The growing ‘securitization’ of outer space," *Space Policy*, Volume 26, Issue 4, November, Available Online to Subscribing Institutions via ScienceDirect)

What, then, is ‘securitization’, and why should it be regarded as anything other than another ‘-ation’ to be added to the pot? Recent decades have seen a rapid and extensive ‘broadening’ of the contexts in which the concept of security is applied and in the range of issues it is seen to cover. From a relatively circumscribed historical association with military threats and issues, the concept of security is increasingly used in reference to ‘non-traditional’ issues, such as migration and environmental degradation. In both policy and academic discourse non-military issues are now frequently referred to as ‘security’ issues by policy makers. Space policy has been far from immune from this wider trend. Such moves to widen the spectrum of security issues can be classified as attempts at ‘securitization’, a term coined by the group of scholars within security studies commonly referred to as the ‘CopenhagenSchool’.2 Securitization is, in broad terms, the process through which a non-military issue comes to be seen as an issue of security. When an issue comes to be treated as an issue of national security, it is justifiable to use exceptional political measures to deal with it. It is ‘securitized’: that is, it is treated with the same degree of urgency as military threats to the very existence of a state (as traditionally captured in the concept of ‘national security’), or what the Copenhagen School labels ‘existential threats’. At its most fundamental the idea of national security assumes that the state must be protected, therefore it is necessary for the state to maintain standing armies, weapons production and procurement, intelligence agencies, and so on. One of the ways we can distinguish an existential threat, then, is by the level of response it generates. When an issue or development is successfully presented as an existential threat, it legitimises the use of exceptional political measures. A classic military example in international relations is a state’s right to self-defence. If a state is under attack, it claims the legitimate use of extraordinary measures that go beyond normal day-to-day politics: the declaration of a state of emergency or martial law, the rationing of certain goods and services, closure of roads and schools, and so on. Commonly, then, the identification of existential threats sets in chain a number of effects that characterize the specific quality of security problems: urgency e the issue takes priority; and extraordinary measures e authorities claim powers that they would not otherwise have, or curtail rights and liberties that might otherwise apply. In short, securitization is a style of argumentation used in attempts to legitimate the application of extraordinary measures by positioning an issue as equivalent to a threat to national security as it is more traditionally understood. By attempting to portray an issue as a security issue, a securitizing move is made; that is, a move to class an issue in the same category as national defence.

## They Say: “Not Policy Relevant”

### Policymakers need to hear our criticism—its key to progressive democratic change.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

There is a space for resisting Space weaponization and Space warfare. Arms control and disarmament can and must be brought back to the political agenda of global security. It is late enough now, but, ultimately, it seems time to reassess and reinforce arms control and disarmament initiatives before the outer Space Treaty meets the same end as the ABM Treaty. There is no need to wait for a “Space Pearl Harbor” if you do not prepare for it and decide not to deploy the destructive technology required to be developed. But for that to happen, the scholarship on the international politics of outer Space must get more public space – more media coverage – and try to get its voice to be heard in US policymaking circles. It is not too late to hope for an atheist vision of technology in US space power politics.

## They Say: “Permutation”

### Their militarized vision of space forecloses alternative perspectives—only the alternative alone can break the spell.

Peoples 9 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2007 ("Haunted Dreams: Critical Theory, Technology and the Militarization of Space," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

Where the Marcusian perspective arguably becomes more problematic, and certainly more provocative, is in its assertion that a stated desire to dominate, such as that recurrent espoused within recent US space policy, are only the most obvious outward manifestation of an intrinsic connection between technology and domination; his contention that there is a barbarism latent in all technological 'progress'. Proponents of the military use of space as an aspect of current US policy are quick to point out that by space dominance they mean ensuring that the US preserves its access to space in all instances, not that the US should exercise complete control. Certainly, we might also want to refute the claim that technological innovation, in space as in any other realm, necessarily leads to domination. Here it is worth noting that Marcuse himself both dismissed the possibility that we might return to some kind of pre-technological culture and even at his most pessimistic still held out hope for what he termed as 'the chance of the alternatives': It [pre-technological culture] is an outdated and surpassed culture, and only dreams and childlike regressions can recapture it. But this culture is, in some of its decisive elements, also a post-technological one. Its most advanced images and positions seem to survive their absorption into administered comforts and stimuli; they continue to haunt the consciousness with the possibility of their rebirth in the consummation of technical progress. (Marcuse 1962:59) So, in short, there might still be a chance that technological development could encompass more emancipatory social ends – a view extendable once again, presumably, to space technologies. Space has consistently been the realm of dreams, of the fantastical, of (hu)man's striving to explore the unknown (Benjamin 2004) and imagination must certainly be required to think of alternative, less bellicose uses of space. As Wendy Brown notes in a different context, however, 'the figure of dreamwork taken up for political analysis … promises to puncture the conceit of our innocence and virtue: dreams often tell us things we would rather not know about ourselves' (2006:690). Nowhere is this more clearly illustrated than in the case of von Braun and his Rocket Team and their influence upon the US space programme, where the 'dream' metaphor is employed recurrently both by participants and in subsequent historical narratives. The conditions of the advancement of their 'dream' of space exploration are, as was shown, somewhat opaque; even if the connections to forced labour and concentration camps are difficult to prove or disprove with finality, the vagaries of the past continue to exert a haunting quality to, as Marcuse put it, 'the accomplishments of man – the space flights; the rockets and missiles'. As in Goya's painting, the sleep of reason produces monsters. In this sense, it is perhaps worthwhile tarrying with the negative potentialities of the military use of space, even if these potentialities are still only in their infancy and dreams of 'space control' seem as fantastical as utopian visions for future space exploration and colonization (Radford 2006). Marcuse's approach is suggestive of a move from, to paraphrase one of his own works, technology to hauntology:12 current developments in space technology in the US in particular are haunted most immediately by the prospects for greater destructive capacity that they portend, but also by alternative visions for the use of space that they preclude. Marcuse argues that 'Naming the "things that are absent" is breaking the spell of the things that are' (1962:68), and at the current moment there is a vital need to point out not only the negative consequences of the weaponization of space, but also to understand the tendency to conceive of space within a militarized framework in the first place (think of the multiple visions of conflict in space that saturate the science fiction genre), and the rival ways of thinking about space that risk being marginalized as a result (for example, those with an emphasis on exploration or space, on outer space as a weapons free 'sanctuary', or less anthropocentric understandings of the cosmos). In short, a critical approach to the military use of space must tread a careful path between despondency and determinism in the face of the development of space technology, and the utopian impulse so frequently associated with outer space. Without the former, the latter risks becoming blind idealism; without the latter, assessments of the negative potentialities of space technology risk becoming complicit in the promotion of these largely still nascent capacities. As Joel Whitebook puts it in a different context: 'The following question can still be raised: What is the fate of the transgressive-utopian impulse, given this new sobriety? For better or worse, that impulse will exist as long as people dream'; but 'Any process of enlightenment worth its name must engage the nocturnal' (Whitebook 1996:301). In the case of the militarization of space this might be extended to all aspects of the nocturnal: the dark side of the history of space exploration; space nightmares as well as space dreams.

### The perm fails—prior rejection and complete resistance is key.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

With respect to global ethics the notions of humanitarian laws of war and associated doctrines of just war theory are likely to simply fall by the wayside. As we showed above, the application of force from outer space is most useful for destroying specific targets on very short notice. These types of attacks tend to be aimed at political targets. The primary purpose of such weapons is to single out and eliminate individual adversaries of global order. As such, future military operations, under conditions of space weaponization, are likely to be very brief, aimed at specific individuals and putting an end to insurrections. If a state has the ability to project force around the globe virtually instantaneously, that state has little need to exercise power through territorial conquest, and accordingly little concern about humanitarian and/or just war doctrines. As Hardt and Negri argue, all wars under imperial conditions are civil wars, effectively police actions (Hardt and Negri, 2000: 189). Space weapons will be the technology that will bring about the material conditions for the fulfillment of that prediction. It is interesting that we have no language for the justice of police action comparable to the language of just war theory—the closest concept that exists in the English language is police brutality. But if we are headed towards police actions displacing wars, then global ethicists must start thinking about the ethical implications of targeted killings. When, if ever, are such killings justified? Who monitors these actions to make sure they do not descend into the realm of police brutality? In short, who will watch these global watchmen? Given these grim prospects for a de-territorialized global rule of late-modern empire, are there any possibilities for resistance? While the successful weaponization of space would make effective political resistance extremely difficult, and while such weaponization is a very real possibility, it is by no means a certainty. That is why we believe that resistance to placing weapons in space must begin now. Such resistance could take several forms. In the last 15 years social constructivists have made a convincing case that taboos against the use of chemical weapons, nuclear weapons and land mines have shamed states into abstaining from using these weapons (Price and Tannenwald, 1996). IR scholars should build on this research to focus on creating a taboo against the use and hopefully even the development of space weapons. Second, there is a need to educate the public about the dangerous consequences of placing weapons in space. As of this moment, most information about weapons in space is produced by defense agencies and related think tanks with a vested interest in them. As such, most research largely ignores the dangers of these weapons. An increased awareness of those dangers, not only to those potentially targeted by such weapons but also citizens of countries such as the U.S. that may deploy them, may create public pressure to cut funding to the development programs. If action is not taken now, we believe that the possibilities for resistance to these weapons will decrease dramatically once they are placed in orbit. The state of global domination constituted by such a weapons regime would mean that those who dared to speak out against such a regime might themselves become potential targets of such weapons.

There’s a “Social Location DA” to their permutation:

Role Playing as space elite only causes space militarization founded on a cold war logic—the result is self-fulling prophecies and serial policy failures. Reject the lens through which they view the world to open space for emancipatory praxis.

### Expertism DA: they prioritize high-level elites who make militarism inevitable—only the alternative’s outsider perspective can effectively challenge the dominant discourse.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

With Space weaponization as conceived by US strategic elites, the conception of the enemy strangely recalls the Cold War logic and the strategic logic introduced by the atomic weapon. This is what Paul Virilio has termed “inversion”, when the enemy is created by the US itself and by its blind faith in technology. During the Cold War, for the US this has meant that its own weaponry, technology, and technoscientific know-how would lead it to its own end. In the War on Terror and in the context of Space weaponization, this means that technology produced by the US is itself the enemy of the United States and its savior: “the faith that the U.S. government and others show in technology is disturbing. They don’t care that what they want is deemed impossible now; they assume that eventually *anything* will be technologically possible” (Gray, 2005: 34). This problematic logic is inherent in deterrence strategy, as deterrence highlights the ambiguity that lies behind the politics of protection, as it poses the armor as offense *and* defense (Virilio, in Der Derian, 1998: 48). But in trying to go beyond deterrence, protection becomes the only strategy worth pursuing, and in regard to outer Space, it means to be ready to finally weaponize Space with the objective of preventing its weaponization. The antimissile shield is thus only the first step as weaponization is thought to be the rational defensive/offensive measure to protect the nation and the globe. This self-fulfilling thinking is deeply problematic as it cannot escape bringing that which it first seeks to eradicate, that is, insecurity and uncertainty in international affairs, and US homeland security. This logic that envisions to wage war in Space follows the same logic that has made technology a religion across US history (and this is when a discourse of US technological superiority was not already enmeshed in a religious discourse). On the strategic level, the US objectives to control Space and to ensure its non-weaponization by being the weaponizing agent are the results of the politics of fear of the Bush administration who has claimed that deterrence had failed with September 11, 2001. By substituting the nuclear war, the “imaginary war”, with a global permanent war on terror, US strategic elites conceive a new imagined war, a Space war, where the “earth [is] treated from the outside and as one *sole object*, by distributing through the whole [space] the different zones of danger, which explains the technological development of an extraordinary observation and spying material for the planetary whole from Space” (Virilio, 1976: 134, note 1; original emphasis). For Virilio, the question should be framed in terms of civilization and we should criticize the nuclear logic as being “indefensible”. What is challenged is the military logic imposed by the US national security state governmental regime and its Soviet counterpart; today, the same national security state governmental regime has decided to bring this military in outer Space. It is the US strategists, the astropolitical elites, and the national security state governmental regime that allows this discourse to arise and endure and to sway the US to prepare for Space warfare. In the same spirit that going to extremes with an imaginary nuclear war was deeply problematic and had to be criticized during the Cold War, the same should be said about imagined Space wars. For a nuclear war as for Space war, it would not be anymore a war between militaries, which has indeed become impossible in postmodern wars, but “a war from the military to the civilian through an unbounded escalation inside civilian insecurity” (Virilio, 1976: 135-136; original emphasis). It is from this subject-position that I raise my voice against Space weaponization and that I aim to critique US Space warfare strategy. Virilio talks of the propagation of the atomic weapon, the *absolute weapon*, as a “faith in the Good News”, in a position that embraces the idea where military technology and strategy are uplifted to the statute of religion by national security technocrats (Virilio, 1976: 141). He hence shows how this religion of technology is that of a strategic elite, which wallows in a problematic instrumental rationalism. The non-specialists and the members of civil society certainly do not grant military technology and strategy with the same blessing, especially when they think about the possible traumas and repercussions nuclear strikes would bring to defenseless populations. Outside high politics circles, among neophytes, the danger then is not so much the nuclear weapon itself, even though its very existence appears as dangerous, but the auto-da-fé, the nuclear faith” proclaimed by the strategic and astropolitical elites (Virilio, 1976: 143). The reverse logic prevails in regard to the weaponization of Space, as the danger is the very existence of Space weapons and their implementation in Space, which would mean that Space has become weaponized. The technological conditions of possibility for Space weaponization may yet exist, but nothing is ineluctable and humans may decide to go on without weaponizing Space. They will however need to review the security logic and the interpretation of a so-called failure of strategic deterrence. This is where the problems still resides, with deterrence. Virilio stresses that “to make war on war” is deterrence’s slogan, and that “deterrence is in fact only a permanent form of absolute attack” (Virilio, 1976: 146-147). In this very sense, the equilibrium of terror is not a panacea and does not establish the conditions of possibility of a world peace, but only of a “total peace”.

## They Say: “Natural Threats Are Real”

### Their fears of nature are driven by an insecure anxiety about being crushed—their scenarios are not grounded in reality.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

As well as sometimes portraying space colonization as a positive step, science fiction often portrays it is a necessary development in the light of various future doomsday scenarios (Williams 1988). Astrofuturism often employs, for example, the ‘limits to growth’ hypothesis, as outlined by the Club of Rome (Meadows et al. 1972; see also Meadows et al. 2005). O’Neill and Ben Bova were amongst those influenced in this way. As explained earlier, The Limits to Growth argued that the Earth’s ecological systems and resources were under increasing pressure from a rapidly growing population. Whole ecosystems were threatened as well as the resources needed to feed this growing population and its rapidly increasing levels of consumption. Crisis and catastrophe are therefore at hand. Other fears relate to a nuclear winter on Earth or some viral outbreak (see Carl Sagan’s son’s Idlewild, Sagan 2004), asteroid impact (as portrayed in the film Deep Impact, Leder 1998) or the death of the Sun (Sunshine, Boyle 2007). This kind of existential anxiety (to use Giddens’ (1991) term) and desire to escape is translated into a psychoanalytic framework by Lasch as a consequence of the ‘culture of narcissism’, and this is used to explain people’s interest in colonizing space (1979: 49, 1984: 87–90). Laing (1965) observes that ontologically insecure people often face ‘anxiety about obliteration, of being engulfed, crushed or overwhelmed by externally impinging events’ (in Giddens 1991: 53). Smelser (1962: 90) argues that mass anxiety underlies fear of asteroid impact. One obvious step is escape into the bolthole of outer space, making happier lives in new kinds of society beyond Earth. It should be noted that, although present, anxiety themes are less prominent amongst prospace advocates than the more positive and self-affirming reasons for development and settlement (Ormrod 2007).

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# Critique of Non-Military Cases

## 1NC—Critical Astropolitics Critique

### The affirmative’s call for space exploration and/or development is a Trojan Horse—dual-use capabilities ensure that the military capitalizes on space technologies to achieve new forms of political killing.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

The weaponization of space—the act of placing weapons in outer space—has an intimate relationship to space exploration, in that the history of the former is embedded in the latter, while the impetus for space exploration, in turn, is embedded in histories of military development. Since the launch of Sputnik, states that have ability to access— and hence to explore—outer space have sought ways in which that access could improve their military capabilities. Consequently, militaries in general and the U.S. military in particular have had a strong interest in the military uses of space for the last half century. Early on, the military interest in space had two direct expressions: enhancing surveillance; and developing rocketry technologies that could be put to use for earth- based weapons, such as missiles. Militaries also have a vested interest in the “dual-use” technologies that are often developed in space exploration missions. While NASA goes to great lengths in its public relations to stress the benefits to science and the (American) public of its space explorations, it is noteworthy that many of the technologies developed for those missions also have potential military use. The multiple interests that tie together space exploration and space weaponization have been vigorously pursued and now are beginning to be substantially realized by a very small number of militaries, most notably that of the United States. For example, since the 1990 Persian Gulf War, the U.S. military has increasingly relied on assets in space to increase its C3I (Command, Control, Communication, and Intelligence) functions. Most of these functions are now routed through satellites in orbit. In addition, new precision weapons, such as JDAM bombs, and unmanned drones, such as the Predator, rely on Global Positioning System satellites to help direct them to their targets, and often these weapons communicate with headquarters through satellite uplinks. For another instance, NASA’s recently completed Deep Impact mission, which entailed smashing part of a probe into a comet to gather information about the content of comet nuclei, directly served the U.S. military in developing the technology and the logistical capabilities to intercept small objects moving at very fast speeds (approximately 23,000 miles per hour) (NASA, 2005). As such, the technologies can be adapted for programs such as missile defense, where a similar problem of intercepting an object moving at a very high speed is confronted. So, in a certain sense, the military colonization of outer space has already begun to a significant extent—it is no longer a distant future vision, nor an unrealizable fiction. We are not in a position to detail all of the technological or strategic manifestations of this important development. Pretending to be able to do so would distract from the purposes of this paper. Our concern, instead, is with the broad forms of space weaponization that are now being actively pursued—again, especially by the U.S.—and/or that are very much alive on the drawing board and in the U.S. military imagination. Our intent is to sketch the contours of emerging forms of space weaponization and how they might be used, without getting bogged down in technical details, in order to develop an argument concerning the constitutive effects on sovereignty—and in turn the socially productive effects on the political subjects of global life—of each of these new modes of political killing.

### The militarization of space expands US sovereignty to legitimize violence—the aff reduces the world to Bare Life.

Duvall and Havercroft 6 — Raymond D. Duvall, Professor of Political Science at the University of Minnesota, and Jonathan Havercroft, Lecturer in Political Science at the University of Victoria, 2006 ("Taking Sovereignty Out of This World: Space Weaponization and the Production of Late-Modern Political Subjects," Paper Presented At The Annual Meeting Of The International Studies Association, Panel SC08: Reading Outer Space, March 22nd-25th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/0/9/8/6/8/p98680\_index.html, Accessed 07-18-2011)

Thus, application of force from outer space would have at least three crucially important constitutive effects. First, it would constitute the possessor of these weapons— presumably the U.S.—as the center of a globally extensive, late-modern empire[,](http://citation.allacademic.com//meta/p_mla_apa_research_citation/0/9/8/6/8/pages98680/isa06_proceeding_98680-18.html) 17 a sovereign of the globe. But this global sovereign would exercise its power in a new way. Rather than needing to control the land, sea, and airspace of all of the Earth, it could rely on space weapons—because they enable the precise application of force at any point on earth, on short notice—to control the globe. While these weapons are not particularly useful in fighting large-scale wars, or in the conquest of territory, they make such conventional uses of military power moot, in large part. There is no longer a need to exercise sovereign power through the control of territory, all one has to do is kill—or perhaps even threaten to kill—potential adversaries around the world in order to gain one’s wishes. In short, the type of power potentially wielded by such a sovereign would be far more absolute than any encountered throughout history. 18 Second, these weapons, just as space-based missile defense was seen above to do, would effectively strip states of their ability to exercise sovereignty over their territories. While de jure sovereignty may remain intact, their de facto sovereignty would be effectively erased. For decades, realist international relations scholars have promoted the idea that states secure their sovereignty through self-help (Waltz, 1979). If states lack the capacity to defend themselves from adversaries they are particularly vulnerable to attack and conquest. While other scholars from liberal and constructivist schools of thought have questioned how closely sovereignty is linked to military capability, throughout history states with disproportionate military power have repeatedly violated the sovereignty of weaker states (Krasner, 1999). While space-based weapons in and of themselves would not enable conquest of another state, they could be used very effectively to achieve precise political objectives without a credible possibility of retaliation. Imagine what impact these weapons would have on U.S. foreign policy with respect to two of its most pressing objectives at this point in time. Consider, for one, how useful such weapons might be with respect to preventing a rival state such as Iran or North Korea from acquiring nuclear weapons. While there has been speculation that the U.S. or Israel may launch air strikes against potential nuclear weapons manufacturing facilities in these countries, the logistics—getting access to airspace from neighboring countries, and the possibility of retaliation against military forces in the area—make such operations difficult to carry out. Using weapons in space to conduct such missions would avoid these logistical difficulties, thereby making them easier (and presumably more likely). The threat of using space weapons on either the manufacturing sites of weapons of mass destruction or on the political leadership of an adversary in most cases probably would be sufficient to alter the behaviour of governments. In short, if the U.S. were to deploy such weapons in space, they would likely be used to much the same effect as the gunboat diplomacy of the 19 th century. A second contemporary policy objective is to fight specific non-state actors. The *9/11 Commission Report* discussed in great detail the logistical obstacles that prevented the Clinton administration from capturing or killing Osama Bin Laden (National Commission on Terrorist Attacks upon the United States, 2004: 108-15). The primary obstacle was the difficulty in either launching cruise missiles into Afghanistan through another state’s airspace or deploying U.S. Special Forces in an area so remote from U.S. military bases. Again, had the U.S. had space-based weapons at the time, they probably would have been the weapons of choice. When combined with intelligence about the location of a potential target, they could be used to kill that target on very short notice without violating the air space of other states, or needing to have a military base nearby to offer a support role. In effect, any person or group of people anywhere on Earth could be targeted on very short notice, thereby constituting everyone everywhere as objects of the global sovereign. All would be subject to the rule of the U.S. state. The sovereignty of states would no longer be an obstacle to killing enemies, and these assassinations could be carried out rather easily without the threat of retaliation by the state whose sovereignty has been violated. The example of using space weapons to target non-state actors such as Osama Bin Laden and Al Qaeda points to a third constitutive effect of space weapons. Because these weapons could target anyone, anywhere, at anytime, everyone on the Earth is effectively reduced to “bare life” (Agamben, 1998). As Agamben demonstrates in *Homo Sacer* (1998), one of the constitutive powers of the sovereign is to determine who is outside the laws and protections of the state. While human rights regimes and the rule of law may exist under a late-modern global empire policed by space weapons, 19 the global sovereign will have the ability to decide the exception to this rule of law, and this state of exception in many cases may be exercised by the use of space weapons that constituted this sovereign in the first place.

### That risks extinction.

Dean 1 — Mitchell Dean, Professor of Sociology at Macquarie University (Australia), 2001 (“'Demonic Societies': Liberalism, Biopolitics, and Sovereignty,” *States of Imagination: Ethnographic Explorations of the Postcolonial State*, Edited by Thomas Blom Hansen and Finn Stepputat, Published by Duke University Press, ISBN 0822327988, p. 53-56)

This allows us, first, to consider what might be thought of as the dark side of biopolitics (Foucault 1979a: 136-137). In Foucault's account, biopolitics [end page 53] does not put an end to the practice of war: it provides it with new and more sophisticated killing machines. These machines allow killing itself to be reposed at the level of entire populations. Wars become genocidal in the twentieth century. The same state that takes on the duty to enhance the life of the population also exercises the power of death over whole populations. Atomic weapons are the key weapons of this process of the power to put whole populations to death. We might also consider here the aptly named biological and chemical weapons that seek an extermination of populations by visiting plagues upon them or polluting the biosphere in which they live to the point at which bare life is no longer sustainable. Nor does the birth of biopolitics put an end to the killing of one's own populations. Rather, it intensifies that killing—whether by an "ethnic cleansing" that visits holocausts upon whole groups or by the mass slaughters of classes and groups conducted in the name of the utopia to be achieved.

There is a certain restraint in sovereign power. The right of death is only occasionally exercised as the right to kill and then often in a ritual fashion that suggests a relation to the sacred. More often, sovereign power is manifest in the *refraining* from the right to kill. The biopolitical imperative knows no such restraint. Power is exercised at the level of populations and hence wars will be waged at that level, on behalf of everyone and their lives. This point brings us to the heart of Foucault's provocative thesis about biopolitics: that there is an intimate connection between the exercise of a life-administering power and the commission of genocide: “If genocide is indeed the dream of modern powers, this is not because of a recent return of the ancient right to kill: it is because power is situated and exercised at the level of life, the species, the race, and the large-scale phenomena of population” (1979a: 137). Foucault completes this same passage with an expression that deserves more notice: "massacres become vital."

There is thus a kind of perverse homogeneity between the power over life and the power to take life characteristic of biopower. The emergence of a biopolitical racism in the nineteenth and twentieth centuries can be approached as a trajectory in which this homogeneity always threatened to tip over into a dreadful necessity. This racism can be approached as a fundamental mechanism of power that is inscribed in the biopolitical domain (Stoler 1995: 84-85). For Foucault, the primary function of this form of racism is to establish a division between those who must live and those who must die, and to distinguish the superior from the inferior, the fit from the unfit. The [end page 54] notion and techniques of population had given rise, at the end of the nineteenth century, to a new linkage among population, the internal organization of states, and the competition between states. Darwinism, as an imperial social and political program, would plot the ranking of individuals, populations, and nations along the common gradient of *fitness* and thus measure *efficiency*.6 However, the series “population, evolution, and race” is not simply a way of thinking about the superiority of the "white races" or of justifying colonialism, but also of thinking about how to treat the degenerates and the abnormals in one's own population and prevent the further degeneration of the race.

The second and most important function for Foucault of this biopolitical racism in the nineteenth century is that "it establishes a positive relation between the right to kill and the assurance of life" (Stoler 1995: 84). The life of the population, its vigor, its health, its capacities to survive, becomes necessarily linked to the domination of internal and external threats. This power to disallow life is perhaps best encapsulated in the injunctions of the eugenic project: identify those who are degenerate, abnormal, feeble-minded, or of an inferior race and subject them to forced sterilization; encourage those who are superior, fit, and intelligent to propagate. Identify those whose life is but mere existence and disqualify their propagation; encourage those who can partake of a sovereign existence and of moral and political life. But this last example does not necessarily establish a positive justification for the right to kill, only the right to disallow life.

If we are to begin to understand the type of racism engaged in by Nazism, however, we need to take into account another kind of denouement between the biopolitical management of population and the exercise of sovereignty. This version of sovereignty is no longer the transformed and democratized form founded on the liberty of the juridical subject, as it is for liberalism, but a sovereignty that takes up and transforms a further element of sovereignty, its "symbolics of blood” (Foucault 1979a: 148).

For Foucault, sovereignty is grounded in blood—as a reality and as a symbol—just as one might say that sexuality becomes the key field on which biopolitical management of populations is articulated. When power is exercised through repression and deduction, through a law over which hangs the sword, when it is exercised on the scaffold by the torturer and the executioner, and when relations between households and families were forged through alliance, "blood was a *reality with a symbolic function*." By contrast, for bio- [end page 55] politics with its themes of health, rigor, fitness, vitality, progeny, survival, and race, “power spoke *of* sexuality and *to* sexuality” (Foucault 1979a: 147).

For Foucault (1979a: 149-50), the novelty of National Socialism was the way it articulated “the oneiric exaltation of blood," of fatherland, and of the triumph of the race in an immensely cynical and naïve fashion, with the paroxysms of a disciplinary and biopolitical power concerned with the detailed administration of the life of the population and the regulation of sexuality, family, marriage, and education.7 Nazism generalized biopower without the limit-critique posed by the juridical subject of right, but it could not do away with sovereignty. Instead, it established a set of permanent interventions into the conduct of the individual within the population and articulated this with the “mythical concern for blood and the triumph of the race.” Thus, the shepherd-flock game and the city-citizen game are transmuted into the eugenic ordering of biological existence (of mere living and subsistence) and articulated on the themes of the purity of blood and the myth of the fatherland.

In such an articulation of these dements of sovereign and biopolitical forms of power, the relation between the administration of life and the right to kill entire populations is no longer simply one of a dreadful homogeneity. It has become a necessary relation. The administration of life comes to require a bloodbath. It is not simply that power, and therefore war, will be exercised at the level of an entire population. It is that the act of disqualifying the right to life of other races becomes necessary for the fostering of the life of the race. Moreover, the elimination of other races is only one face of the purification of one's own race (Foucault 1997b: 231). The other part is to expose the latter to a universal and absolute danger, to expose it to the risk of death and total destruction. For Foucault, with the Nazi state we have an "absolutely racist state, an absolutely murderous state and an absolutely suicidal state" (232), all of which are superimposed and converge on the Final Solution. With the Final Solution, the state tries to eliminate, through the Jews, all the other races, for whom the Jews were the symbol and the manifestation. This includes, in one of Hitler's last acts, the order to destroy the bare life for the German people itself. “Final Solution for other races, the absolute suicide of the German race” is inscribed, according to Foucault, in the functioning of the modern state (232).

### The alternative is to reject the affirmative’s call for space domination in favor of critical geopolitics—this is a prerequisite to effective space exploration.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Conclusions Stephen Graham, following Eyal Weizmann, has argued that geopolitics is a flat discourse (Graham, 2004: 12; Weizmann, 2002). It attends to the cartographic horizontality of terrain rather than a verticality that cuts through the urban landscape from the advantage of orbital supremacy. Just as, for Graham, a critical geopolitics must urgently consider this new axis in order to challenge the practices and assumptions of urbicide, so too – I would argue – it must lift its gaze to the politics of the overhead. Our interest in the vertical plane must extend beyond terrestrial perspectives; we must come to terms with the everyday realities of space exploration and domination as urgent subjects of critical geographical enquiry. A prerequisite for this agenda is to overcome our sense of the absurdity and oddity of space, an ambivalence that has not served human geography well. The most obvious entry point is to think systematically about some of the more concrete expressions of outer space in the making of Earthly geographies. For instance, many of the high profile critical commentaries on the recent war in Iraq, even those written from geographical perspectives, have been slow to address the orbital aspects of military supremacy (see for instance, Harvey, 2003; Gregory, 2004; Retort, 2005). Suffice to say that, in war as in peace, space matters on the ground, if indeed the terrestrial and the celestial can be sensibly individuated in this way. There is also, I think, scope for a wider agenda on the translation of particular Earthly historical geographies into space, just as there was a translation of early occidental geographies onto imperial spaces. When Donald Rumsfeld talks of a ‘Space Pearl Harbor’, there is plainly a particular set of historico–geographical imaginaries at work that give precedence, in this case, to American experience. Rumsfeld has not been slow to invoke Pearl Harbour, most famously in the aftermath of September 11; notably, in all these examples – Hawaii in 1941; New York in 2001; and the contemporary space race – there lurks the suggestion of a threat from the East9. All of this is a reminder that the colonisation of space, rather than being a decisive and transcendent break from the past, is merely an extension of longstanding regimes of power. As Peter Redfield succinctly observed, to move into space is ‘a form of return’: it represents ‘a passage forward through the very pasts we might think we are leaving behind’ (Redfield, 2002: 814). All of this supports the idea that space is part and parcel of the Earth’s geography (Cosgrove, 2004: 222). We can conceive of the human geography of space as being, in the words of Doreen Massey, ‘the sum of relations, connections, embodiments and practices’ (Massey, 2005: 8). She goes on to say that ‘these things are utterly everyday and grounded, at the same time as they may, when linked together, go around the world’. To this we might add that they go around and beyond the world. The ‘space’ of space is both terrestrial and extra- terrestrial: it is the relation of the Earth to its firmament. Lisa Parks and Ursula Biemann have described our relationship with orbits as being ‘about uplinking and downlinking, [the] translation [of] signals, making exchanges with others and positioning the self’ (Parks and Biemann, 2o03). It is precisely this relational conception of space that might helpfully animate a revised geographical understanding of the Outer Earth. As has already been made clear, this sort of project is by no means new. Just as astropolitics situates itself within a Mackinderian geographical tradition, so a critical geography of outer space can draw on geography’s early modern cosmographical origins, as well as on more recent emancipatory perspectives that might interrogate the workings of race, class, gender and imperialism. Space is already being produced in and through Earthly regimes of power in ways that undoubtedly threaten justice and democracy. A critical geography of space, then, is not some far-fetched or indulgent distraction from the ‘real world’; rather, as critical geographers we need to think about the contest for outer space as being constitutive of numerous familiar operations, not only in respect of international relations and the conduct of war, but also to the basic infrastructural maintenance of the state and to the lives of its citizenry. Geography is already well placed to think about these things; there are many well worn lines of geographical critique that have their parallel in space. For instance, there are pressing ‘environmental’ questions about the pollution of Earth’s orbit with space ‘junk’, a development which is seriously compromising the sustainable use of Lower Earth Orbit. This high-speed midden, already of interest to archaeologists (see Gorman, 2005), is coming up for its fiftieth anniversary in 2007, after the launch of the Russian satellite Sputnik on the 4th October 1957. Since then, the sheer variety and number of discarded objects is remarkable. From lens caps to frozen astronaut faeces, the number of orbiting articles greater than 10cm in diameter currently being tracked is over 9000 (Brearley, 2005: 9). The ability to think critically about nature conservation and heritage policy – another aspect of the geographer’s remit – may also have an extra-terrestrial transference, as wilderness and ‘first contact’ paradigms look set to be mobilized in space (Cockell and Horneck, 2004; Rogers, 2004; Spennemann, 2004). One might further speculate that the economic geography of outer space would be a rich, if as yet undeveloped, avenue of enquiry. And a cultural and historical geography of space offers numerous flights of fancy, from questions of astronautical embodiment to the politics of planetary representation. All of this is to say that a geography of outer space should be a broad undertaking, aside from the obvious project of a critical geo/astropolitics. Lastly, a critical geography must not be overly pessimistic, nor must it relinquish an engagement with space technology on the grounds that this has, to date, been driven largely by military agendas. The means of our critique may require us to adopt such technologies, or, at least to ask what opportunities they present for radical praxis. One thinks here of various forms of playful and subversive activism, experiment and art-event that have deliberately toyed with space hardware (Triscott and la Frenais, 2005; Spacearts, 2006). GPS receivers can help us think reflexively about position (Parks 2001); remote sensing can be used to explore political conditions in the world (Parks and Biemann, 2o03); amateur radio-telescopy can help us re-conceptualize space by attuning us to the sonorous qualities of its scientific ‘data’ (Radioqualia, 2003); even rocket science can still carry utopian freight (Chalcraft, 2006). Through such means, can space be given a truly human geography.

### Positioning ourselves as critical intellectuals spurs socially progressive change and prevents otherwise inevitable conflicts—the act of criticism is policy-relevant and our critique internal link turns their “cede the political” gripes.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

Using his knowledge to support the dispossessed, Etzioni was raising the whole issue of whether the United States should engage in a space race at all, given the kinds of issues with which the dispossessed and the popular classes were much more concerned. Furthermore, he spelt out alternatives to the ‘common sense’ surrounding space travel and the militarization of outer space. As he wrote: One of the major duties of university people, even if there is no consensus whatsoever among them, is to keep raising issues – such as the value of fallout shelters, or the logic of sending a man to the Moon, or the logic of deterrence – thereby extending the public debate to include new alternatives. (Etzioni 1964: 64, original emphasis) Etzioni’s study, in short, certainly did not claim to be ‘objective’. It was an explanation of reality that was demonstrating that alternatives were possible. In this book we have aimed to go even further towards revealing ‘the worm in the apple’ of space humanization: outlining the capital processes which underpin it and in the process stripping away some of the hegemonic assumptions that serve to obscure them. This is what Roy Bhaskar (1986) refers to as an explanatory critique: the deliberate undermining of the false beliefs created by society based on social power and coercion. An explanatory critique exposes the causal mechanisms and elements that underlie the complexity of the social life and of the universe. Moreover, it exposes the ways in which these mechanisms are used by the powerful as a means of enhancing their authority over the rest of society. The science of outer space is now being deployed to humanize the cosmos in ways that not only reproduce the social order, but extend this order indefinitely into the cosmos. But an explanatory critique hopefully also shows that there is nothing inevitable about this process. Social and political alliances can be, and are being, forged against this particular form of humanization. New types of common sense can be constructed. Contemporary forms of subjectivity which are alienated from the cosmos and dreaming about being part of it are not inevitable. They are the product of recent times and can certainly undergo change in a more socially progressive direction.

# ---- Link Materials

## Link—Space Exploration

### Space exploration is used to justify imperialism.

MacDonald 8 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2008 ("Space and the Atom: on the popular geopolitics of Cold War rocketry," Article Submitted to the journal *Geopolitics*, Available Online at http://www.landfood.unimelb.edu.au/rmg/geography/papers/SpaceandtheAtom.pdf, Accessed 07-18-2011)

A related argument worth mentioning is that a geography of outer space is a logical extension of earlier geographies of imperial exploration12. Space exploration has used exactly the same discourses, the same rationales, and even the same institutional frameworks (such as the International Geophysical Year, 1957-1958) as terrestrial exploration. And like its terrestrial counterpart, the move into space has its origins in older imperial enterprises13. Marina Benjamin argues that for the United States outer space was ‘always a metaphorical extension of the American West’14. When Frederick Jackson Turner argued in 1893 that the frontier was central to American identity and nationhood, his thesis could equally be applied to the US space programme’s encounter with the ‘final ontier’ in the twentieth century. Peter Redfield makes a similar point in relation to the French Arianne space programme which relied on its earlier colonial ties to take advantage of the fuel economies associated with an equatorial launch, rather than sites at lower latitudes. Looking at the imbricated narratives of colonialism and rocketry in French Guiana, he makes the case that ‘outer space reflects a practical shadow of empire’16.

## Link—Space Tech Innovation

### The Aff’s Truth claims disallow the existence of political discourse on a local level—our critique is necessary to avoid an Olympian world of astropolitical dominance.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

In all these geographical precedents, the enabling character and production of space itself tends to be assumed. This much is also true for some of the literature from Sociology of Scientific Knowledge (SSK) and Science, Technology and Society (STS) concerned with missile or space technology. Both of these fields have done much to expose the contingency of technological outcomes and to denaturalize the ‘inevitability’ of technical progress (Mackenzie, 1990; Mack, 1990; Mort, 2002). However, the key monographs on missile and satellite programmes by Donald Mackenzie, Pamela Mack and Maggie Mort, while taking a broadly SSK or STS approach, do not for the most part apply this perspective specifically to outer space. Only Peter Redfield, writing in Social Studies of Science, conceives space as a problematic which calls into question some of the cherished tenets of contemporary social theory (Redfield, 2002). Where, for instance, does the study of outer space leave political discourses of ‘grounded- ness’ (Massey, 2005) or ‘grass-roots’? Or, for that matter, the repeated mantra (especially prominent in sociologies of science and histories of geography) that ‘all knowledge is local’ (see Geertz, 1983: 4)? ‘All knowledges, practices and objects may indeed be local, but are they equally local?’ asks Redfield (Redfield, 2002: 792). This point also has a bearing on the feminist argument, very familiar to geographers, about the situatedness of knowledge and vision. There is a vast literature in geography which critiques the notion of an Olympian view, arguing instead for a politics and an epistemology of location, positioning and (once again) groundedness. Informed by Donna Haraway’s work, it makes the case that partiality rather than universality is the basis from which we should make rational knowledge claims (Haraway, 1991). How will this argument fare in an era when there is no point on the Earth’s surface, nor in the Earth’s atmosphere (nor even, increasingly, below the Earth’s surface) that is not subject to the gaze of satellite surveillance? This is not to question the political necessity of Haraway’s disclosure of position – nor to suggest that a view from space is anything other than situated – but to draw attention to the changing circumstances in which this tactic might be deployed, remembering too that a satellite is a great deal more Olympian than Mount Olympus. It seems that, literally and figuratively, it is this ‘god-trick’ so explicitly forbidden by Haraway that is now the primary goal of astrostrategy (Haraway, 1991: 195).

## Link—Fear/Big Impacts

### Fear based space rhetoric ensures civilian tech will be used to justify further militarization and weaponization.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

In post-Cold War unipolar times the strategic rationale for the United States to maintain the prohibition against weaponising space is diminishing (Lambakis, 2003), even if the rest of the world wishes it otherwise. In 2000, a UN General Assembly resolution on the ‘Prevention of an Arms Race in Outer Space’ was adopted by a majority of 163-0 with 3 abstentions: the United States, Israel and the Federated States of Micronesia (United Nations, 2000). Less than two months later, a US Government committee chaired by Donald Rumsfeld issued a report warning that the ‘relative dependance of the US on space makes its space systems potentially attractive targets’; the United States thus faced the danger, it argued, of a ‘Space Pearl Harbor’ (Rumsfeld, 2001: viii). As space warfare was, according to the report, a ‘virtual certainty’, the United States must ‘ensure continuing superiority’ (Rumsfeld, 2001: viii). This argument was qualified by obligatory gestures towards ‘the peaceful use of outer space’ but the report left little doubt about the direction of American space policy. Any difficult questions about the further militarisation (and even weaponisation) of space could be easily avoided under the guise of developing ‘dual-use’ (military/civilian) technology and emphasising the role of military applications in ‘peace-keeping’ operations. Through such rhetoric, NATO’s satellite-guided bombing of a Serbian TV station on the 23rd April 1999 could have been readily accommodated under the OST injunction to use outer space for ‘peaceful purposes’ (Cervino, 2003). Since that time new theatres of operation have been opened up in Afghanistan and Iraq, for further trials of space-enabled warfare that aimed to provide aerial omniscience for the precision delivery of ‘shock and awe’. What Benjamin Lambeth has called the ‘accomplishment’ of air and space power, has since been called into question by the all too apparent limitations of satellite intelligence in the tasks of identifying Iraqi Weapons of Mass Destruction or in stemming the growing number of Allied dead and wounded from modestly-armed urban insurgents (Lambeth, 1999; Graham, 2004; Gregory, 2004: 205). For all its limitations, even this imagery has been shielded from independent scrutiny by the military monopolization of commercial satellite outputs (Livingstone and Robinson, 2003). And yet, far from undermining Allied confidence in satellite imagery or in a ‘cosmic’ view of war (Kaplan, 2006), it is precisely these abstract photo- cartographies of violence – detached from their visceral and bloodied ‘accomplishments’ – that have licenced the destruction of Fallujah (Gregory, 2004: 162; Graham, 2005b). There remains, of course, a great deal more that can be said about the politics of these aerial perspectives than can be discussed here (see, for instance, Gregory, 2004; Kaplan, 2006).

## Link—Hegemony

### Their commitment to American leadership in space results in a state of permanent total war.

Grondin 7 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2007 ("The US Religion of Technology in the Weaponization of Outer Space? A Case for Technological Atheism and Resisting Space War," Paper Presented At The Annual Meeting Of The International Studies Association 48th Annual Convention, February 28th, Available Online via All Academic at http://citation.allacademic.com/meta/p\_mla\_apa\_research\_citation/1/7/8/9/4/p178946\_index.html, Accessed 07-18-2011)

As is often noted, the very logic of a US “national security state” insufflates a war preparedness mentality that tends to make permanent a sense of national emergency and mobilization and which first leads to a militarization of foreign policy and ultimately of everyday life (Sherry, 1995). With all military revolutions (technical, technological and systemic) that humanity – and the US war machine – has produced over the past sixty years, we have come to be aware that military affairs are in a way stuck in sort of a “perpetual revolution” in this realm, while knowing that a perfect security is not attainable and all the more so in an asymmetrical form of war, in a “postmodern war” defined as a mix of limited wars and low level conflicts that intersect locally with global ramifications (Gray, 2006: 26-30). When we link the US neoliberal geopolitics of global dominance to outer Space strategy and factor in the post-September 11 strategic context as interpreted by US strategic elites, we end up trying to make sense of this “perpetual revolution in military affairs” and of this “postmodern war” mentality that have created a War on Terror matrix from which it seems difficult to escape, at least for the US national security state governmental regime (Gray, 2006: 28; Gray, 1997). With the strike on US soil in 2001 and the acknowledgement by US strategic elites that deterrence was not a “rampart” anymore, the United States of George W. Bush thought that it was now “time to seize the high ground once and for all” and to seek control of near Earth Space to control Earth itself (Gray, 2006: 33).7 The militarized securitization of the orbital space by the US comes along a technological matrix that also seeks the territorialization of Space. The de/reterritorialization of outer Space as an American space is linked to the War on Terror, especially because of the protection of information, the detection, and the surveillance activities of the US, which are central in “hunting down” terrorists. In this spatial inscription and securitization of the American identity in Space, the frontiers of the homeland are made global and are secured through a representation of dangers. By focusing on the Report of the Commission to Assess United States National Security Space Management and Organization, that is the Rumsfeld 2001 Space Commission for the Management of Space in the national security strategy, one sees the application of the same reading that would later come with the War on Terror, albeit being more easily accepted as truthful assumptions. To that effect, a terrorist group or rogue state might try to hinder US spatial assets or those of its allies on which the US depends militarily and economically. In its 2004 National Military Stragegy, the US steadfastly reaffirmed its will to constitute a global information grid and achieve a full spectrum-dominance in military matters. The US therefore wants to prevent any threat in outer Space and protect its spatial activities and that of its allies. This is where the technological commitment comes in. Warmaking is central to technologies. But that does not mean that there needs to be a technological determinism nor that war necessarily drives technologically, even though it has shaped many technologies (Gray, 2006: 70). As laments Gray, the US leadership thinks it can “win wars with systems and high technology, not with real understanding” (Gray, 2006: 39). Any war has its own logic, a logic which always slips the control of its advocates, and it can never be controlled and managed, for there are too many unknown factors that are at play, and with unknown and unexpected consequences. The technology may seem to have its own agential power and enforce the idea of war in Space, but “war is always political, not technological. […] War is an intractable problem conceptually; really, the only way to know how a war is going to come out is to fight it” (Gray, 2006: 42-43; my emphasis). There has been a change in the nature of waging war with the advent of nuclear weapons. It was no longer possible to wage a “total war” because of the very nature of these new technologies of warfare that came with nuclear power. For revolution in military affairs (RMA) theorist, Chris Hables Gray, this meant that the new technologies would free other types of war but total war. He hence speaks of a “postmodern war” mindset that requires continuous technological innovations and RMAs (Gray, 2006: 28). With this increased speed and lethality in warfare technology, this perpetual technological revolution in military and security affairs, and the space exploration technology that came in response to the launch of Sputnik came the militarization of space and the “space technological revolution” (McDougall, 1984: 6). US space exploration and its response to Sputnik was first a political venture driven by “national prestige”, as Lyndon Johnson asserted: “Failure to master space means being second best in every aspect, in the crucial arena of our Cold War world. In the eyes of the world first in space means first, period; second in space is second in everything” (Lyndon Johnson, quoted in McDougall, 1984: 8). Consequently, in the national security strategy of every administration since Sputnik, global domination of Space “has been an explicit goal of the US. And with the national security state’s rise there has been a will to securitize spaces of strategic commons” (Posen, 2004). Today, with the fear of the rise of China as a Space power, a similar Cold War logic is applied to the outer Space. However, the change of strategic context imputable to September 11, 2001 seemed to have given the “newly” enacted doctrine of “pre-emption” a “rationale for the abrogation of the treaties preventing war in space and the beginning of the military exploitation of the ‘last frontier,’ which is fortunately infinite” (Gray, 2006: 35).

## Link—GPS

### GPS invades the civilian sphere in order to advance space-enabled military goals—panoptic orbit normalizes geopolitics.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

The geopolitical effects of reconnaissance from space platforms are by no means confined to particular episodes of military conflict. Like high-altitude spy planes, its Cold War precursor, satellite surveillance also gives strategic and diplomatic powers. Unlike aerial photography, however, satellite imagery is ubiquitous, high-resolution and offers the potential for real-time surveillance. The emerging field of surveillance studies, strongly informed by critical geographical thought, has opened to scrutiny the politics and spaces of electronic observation (see, for instance, the new journal Surveillance and Society). The writings of Foucault, particularly those on panopticism, are an obvious influence on this new work (Foucault, 1977; Wood, 2003), but they have seldom been applied to the realm of outer space. As Foucault pointed out, the power of Jeremy Bentham’s panopticon prison design is enacted through the prisoner–subjects internalising the disciplinary gaze: the presence of the gaoler was immaterial, as the burden of watching was left to the watched. Similarly, the power of panoptic orbital surveillance lies in its normalising geopolitical effects. If the geopolitics of surveillance is particularly evident at the level of the state, it applies also to the organization of the daily activities of its citizens (Molz, 2006). GPS technology is perhaps the most evident incursion of space-enabled military– surveillance systems into everyday life, becoming an indispensable means of monitoring the location of people and things. For instance, the manufacturer Pro Tech, riding the wave of public concern about paedophilia in Britain, has developed systems currently being trialed by the UK Home Office to track the movements of registered sex offenders (see also Monmonier, 2002: 134). Somewhat predictably, given the apparent crisis in the spatialities of childhood (Jones et al, 2003), children are to be the next subjects of satellite surveillance. In December 2005, the company mTrack launched i-Kids, a mobile phone/GPS unit that allows parents track their offspring by PC or on a WAP-enabled mobile phone. Those with pets rather than children might consider the $460 RoamEO GPS system that attaches to your dog’s collar, should walkies ever get out of hand. It will surprise no-one that the same technology gets used for less savoury purposes: a Los Angeles stalker was jailed for 16 months for attaching a GPS device to his ex-girlfriend’s car (Teather, 2004). What is more startling, perhaps, is that one does not need to be a GPS-user to be subject to the surveillant possibilities of this technology. Anyone who leaves their mobile phone unattended for five minutes can be tracked, not just by the security services, but by any individual who has momentary access to enable the phone as a tracking device. For the purposes of a newspaper story, the Guardian journalist Ben Goldacre ‘stalked’ his girlfriend by registering her phone on one of many websites for the commercial tracking of employees and stock (Goldacre, 2006). The exercise revealed how easily everyday technologies like the mobile phone can be reconfigured for very different purposes. Even this modest labour in tracking a mobile phone will become a thing of the past. Phones will be more specifically configured as a tracking device: Nokia is due to release a GPS phone in 2007, while the Finnish company Benefon has already launched its Twig Discovery, a phone that has a ‘finder’ capability that locates and tracks other contacts in your address book. Should the user come within range of another contact, the phone will send a message asking whether you are willing to reveal your location to this contact. If both parties are agreeable, the phones will guide their users to each other.

### This results in the militarization of everyday life.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

In this way, the gadgetry of space-enabled espionage is being woven into interpersonal as well as interstate and citizen–state relations. If the movements of a car can be tracked by a jealous boyfriend, they can also be tracked by the state for the purposes of taxation: this is surely the future of road tolls in the UK. A British insurance company is already using satellite technology to cut the premiums for young drivers if they stay off the roads between 11pm and 6am, when most accidents occur. Information about the time, duration and route of every single journey made by the driver is recorded and sent back to the company (Bachelor, 2006). The success of geo-technologies will lie in these ordinary reconfigurations of life such as tracking parcels, locating stolen cars, transport guidance or assisting the navigation of the visually-impaired. Some might argue, however, that their impact will be more subtle still. For instance, Nigel Thrift locates the power of new forms of positioning in precognitive sociality and ‘prereflexive practice’, that is to say in ‘various kinds of culturally inculcated corporeal automatisms’ (Thrift, 2004b: 175). In other words, these sociotechnical changes may become so incorporated into our unconscious such that we simply cease to think about our position. Getting lost may become difficult (Thrift, 2004b: 188). Perhaps we are not at that stage yet. But one can easily envisage GPS technologies enhancing existing inequalities in the very near future, such as the device that will warn the cautious urban walker that they are entering a ‘bad neighbourhood’. In keeping with the logic of the panopticon, this is less ‘Big Brother’ than an army of little brothers: the social life of the new space age is already beginning to look quite different. And it is to this incipient militarization of everyday life that the emerging literature on ‘military geographies’ (Woodward, 2004; 2005) must surely turn its attention.

## Link—Satellites

### Satellite technology is empirically reappropriated by the military—the aff just plays their part in the grand narrative of American exceptionalism.

Orr 4 — Jackie Orr, Associate Professor in the Department of Sociology at Syracuse University, 2004 ("The Militarization of Inner Space," *Critical Sociology*, Volume 30, Issue 2, Spring, Available Online to Subscribing Institutions via SAGE Journals Online)

The battles for which the U.S. Space Command is prepared are not futuristic science fiction scenarios. As the command center responsible for the protection and proliferation of military and commercial satellites, and for the rejuvenated National Missile Defense program, the Space Command is already a key player in the conduct of U.S. war. Satellite- mediated infotech warfare has arrived. The militarized use of space-based satellites to provide real-time flows of information and imagery debuted in the U.S. invasion of Panama in 1989, developed in the 1990s during the U.S.-led war against Iraq and in the killing fields of Kosovo, and is today an integral component of U.S. military activity in Afghanistan and Iraq (Gray 1997; Grossman 2001). “Space support to NATO’s operations in Kosovo was a perfect example of how the United States will fight its wars in the future,” the Space Command reported in 2002, “Satellite- guided munitions, communications, navigation, and weather all combined to achieve military objectives in a relatively short amount of time and without the loss of a single U.S. troop.”4 As home to an increasingly sophisticated and expensive infrastructure of satellites, and to a proposed network of (possibly nuclear-powered) space stations equipped with laser weaponry, ‘outer space’ is now the final, fantastic frontier for the U.S. military’s imaginary and material battlefields. With Full Spectrum Dominance as its official doctrine, the U.S. Space Command clearly articulates its 21st century mission: to ensure that the United States will remain a global power and exert global leadership during the current “globalization of the world economy.” Noting with admirable sociological acumen that this globalization will create a “widening between ‘haves’ and ‘have-nots’ ... [and] [t]his gap will widen – creating regional unrest,” the U.S. Space Command announces that the new strategic situation requires “a global perspective to conduct military operations and support regional warfighting. . .” 5 The U.S. Space Command stands ready to serve.

# ---- Impact Materials

## Impact—Weaponization

### Rhetoric of civilian infrastructure in humanitarian or scientific terms is used to bolster defense and weaponize space.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Although Galileo has been presented as an infrastructural and commercial asset designed ‘specifically for civilian purposes’, another largely unspoken rationale is undoubtedly EU defence (Wilson, 2002: 5). Galileo will surely underpin a future common European defence policy, even if such a development can be currently subsumed under the guise of ‘dual-use’. The European Advisory Group on Aerospace notes that ‘the well being of the [European space] industry depends on twin pillars, namely civil and defence. These are both complimentary and mutually dependent’ (quoted in Cervino et al, 2003: 233). The notion of ‘dual use’ is convenient for governments because it mitigates against declining public defence research budgets. But there are, I think, grounds for concern about it in this case. Investment in what seems to be civilian infrastructure can easily become at the same time, an extension of the militarization and, potentially, the weaponization of space, particularly in an era when warfare is increasingly being couched in ‘humanitarian’ terms. A team of Italian atmospheric scientists have rightly expressed misgivings that the commercial competition in space technology is becoming a de facto arms race that further undermines confidence in UN OST space governance (Cervino et al, 2003).

### The aff’s discourse will be coopted by the military to serve their ends.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Different orbits have different astropolitical purposes. The most crowded portion of space is the Lower Earth Orbit (LEO), between 150 and 800 km above the surface of the Earth. This is the most accessible part of space (in terms of energy expenditure), and the most useful for reconnaissance satellites and manned flight missions. Medium-altitude orbits (MEO) range from 800 to 35,000 km and are often used for navigational satellites (like the American GPS network). High- altitude orbits exceed 35,000 km and provide the maximum coverage of the Earth with a minimum number of satellites. Of particular interest here is Geostationary Orbit (GEO) whereby the orbital period is identical to one full rotation of the earth such that a satellite at 0° inclination (i.e. above the equator) will appear stationary from any fixed point on Earth. This enables near- continuous contact with the Earth, so it is particularly useful for global communications and weather satellites. These then are some of the ‘environmental’ features which influence (rather than determine) the colonisation of outer space and the extent to which any aspiring power can maintain astropolitical dominance. I’ll return to this when discussing the theory and practice of astropolitics. The historic relationship between knowing a space and exerting political and strategic dominion over it is entirely familiar to geographers. Just as the geographical knowledge of Empire enabled its military subjugation, colonization, and ultimately its ecological despoliation, this same pattern is being repeated in the 21st century ‘frontier’4. It is also worth remembering that the geographies of imperialism are made not given. In what follows, I want to examine how the geographies of outer space are being produced in and through contemporary social life on Earth. Such an account inevitably throws up some concerns about the politics and socialities of the new space age. Against this background, I set my argument on a trajectory which is intermittently guided by two key writers on technology with very different sensibilities. It is my intention to hold a line between the dark anticipations of Paul Virilio and the resplendent optimism of Nigel Thrift. This discursive flight may well veer off course; such are the contingencies of navigating space.

## Impact—Serial Policy Failure

### Extending neoliberal hegemony into space ensures serial policy failure.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

What, then, is the status of outer space in 2006? Stanley Kubrick’s classic film *2001: A Space Odyssey*, made in 1968, may not have entirely come to pass but nor was it very wide of the mark. Space has been inhabited by humans, with relatively short absences for the last twenty years, and without interruption since the 2nd November 2000. Our species’ is now represented in space by the crew of the International Space Station (ISS). At a $100 billion, the ISS is the most expensive piece of technology ever built (Jha, 2006). There are currently around 700 operational spacecraft in continuous orbit of the Earth, serving a variety of military, civilian and commercial uses (Johnson, 2004: 81). Over 60 new launches take place every year, and at least 35 nations now have payloads in orbit. Despite the end of the Cold War, a thaw which is widely thought to have restrained progress in the field (Dolman, 2002), space exploration continues apace. For instance, both American and European unmanned vehicles have explored the surface of Mars, beaming back high-resolution pictures of the Martian surface, including of its ice-fields. Forty years since the first Russian space probe landed on Venus, a new major European Space Agency effort was launched in November 2005 to study the surface and atmosphere of Earth’s ‘sister’ planet. And, again, nearly forty years after the first moon landings and despite numerous setbacks for NASA (Vaughan, 1996; 2004), George W. Bush is planning a symbolic return lunar mission in 2018 – ‘a renewed spirit of discovery’ – as a means of mobilising public support for further American investment in space dominance (see Stadd and Bingham, 2004: 21). Among the technical and logistical advances in space technology too numerous to detail here, there are two tendencies that stand out. Firstly, space – and in particular the Lower Earth Orbit (LEO) – can no longer be considered remote. The journey through the Earth’s atmosphere is now made on an almost weekly basis. Such is the steady passage of space vehicles that there is now a growing literature on traffic management (Johnson, 2004; Lála, 2004). The costs of entering space are now so low that students at Cambridge University have tested an ‘amateur’ rocket that they hope can be readily launched to the edge of space (up to 32 km altitude) for under £1000 (Sample, 2006). Secondly, space is becoming ordinary. Space-based technology is routinely reconfiguring our experience of home, work, education and healthcare through applications in the transport, telecommunications, agricultural and energy sectors (Rumsfeld Commission, 2001). Our everyday lives already extend to the outer-Earth in ways that we entirely take for granted. America’s Global Positioning System (GPS), for instance, has become essential to the regular functioning of a variety of machines from bank tellers to super-tankers. The space-based science of weather- forecasting is now integrated into the day-to-day management of domestic and national affairs. Satellite-based telecommunications, particularly international and cellular telephony, are a mundane part of everyday life in the West (see Warf, 2006). More obvious, perhaps, are the technical advances in space-enabled warfare that have inspired recent American military operations in the Balkans, Afghanistan and Iraq (Gray, 2005; Graham, 2004). Following in the vapour-trails of the United States, Europe, Russia and China are also trying to extend their sovereignty into outer space. As I will go on to discuss, terrestrial geopolitics are increasingly being determined by extra-terrestrial strategic considerations. More abstractly, I want to argue that through space exploration, we are forging new subjectivities and new forms of sociality here on earth (Stern, 2000; Shaw 2004). Space is a modality for hyper-mobile information which, in combination with advanced technologies of ‘software-sorting’ (Graham, 2005), has enabled a wider ‘automatic production of space’ (Thrift and French, 2002; see also Dodge and Kitchin, 2005). Above all, I will make the case that outer space is the next frontier for military–neoliberal hegemony, as an earlier conception of space as common property, enshrined in the 1967 UN Outer Space Treaty (OST), becomes subject to re-negotiation. In place of the OST is the prospect of a new space regime, as transformative in its own way as the Bretton Woods consensus, that would oversee the privatisation of space resources in the narrow interests of a global elite. Moreover, it is this conquest of space, I will argue, that underwrites much of the dynamic technological shaping and re-shaping of Earthly environments recently discussed by Nigel Thrift (Thrift 2005).

# ---- Alternative Materials

## Alternative—Extend 1NC Alt

### The plan ensures ineffective space exploration that replicates their harms—the alternative is critical to effective space exploration.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

Alternatively, rather than being founded on the interests of capital, and individualist fantasies, the humanization of outer space could emphasize collective responsibilities on Earth and try to ensure that any gains made through space exploration were spread throughout to improve the lot of the dispossessed on Earth (as was the original aim of the United Nations Moon Agreement). To quote Etzioni, ‘As we move deeper into space we should be facing Earth and allow our deprived world to set the pace’ (1964: 198). In theory, so long as funds are not diverted from more socially necessary projects, this is not incompatible with scientific exploration of outer space aimed at simply discovering how the universe is structured. Earth imaging technology available freely to all can be used to track refugee populations, or chart changes in the environment caused by global warming. So long as it is not motivated by fear and panic, ‘space for peace’ could also include diverting risk stemming from Earth-bound asteroids: a plan under active development by NASA and the European Space Agency (Gray 2007). As President Kennedy acknowledged in 1962, whether space science is used ‘for good or ill depends on man’. He was confident himself that ‘space can be explored without feeding the fires of war, without repeating the mistakes that man has made in extending his writ around this globe of ours’ (Kennedy 1962). There are signs that perhaps the European space programme will cease treating the universe as an object for the exercise of power and instead ensure space technology is used for the public good (Mean and Wilsdon 2004). Alternatively, and much more ambitiously, humanization could attempt to emulate the early twentieth-century Russian cosmists by spreading a socialist or communist society throughout the whole of nearby outer space. This is a highly human-centred project and, as such, can be criticized for simply imposing humanity’s priorities, albeit communist priorities, on the cosmos as a whole. But any project is going to be ‘human’ or ‘anthropocentric’. Is a cosmos reproducing and expanding a socialist or communist society necessarily a problem? Perhaps the significance of the utopian cosmists is that they prefigured the possibility of alternative types of space humanization. Explanatory critique can only go so far. Philosophy and sociology are only tools for uncovering how reality is structured and for freeing up the discussion of feasible alternatives. It will take much hard work and politics on a mass scale to forge new social alliances, counter-hegemonic ideologies and space projects that benefit oppressed populations. The ultimate aim of this must be a relationship with the universe that does not further empower the already powerful.

### Challenging dominant discourses via critique is essential in the context of space policy.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

Let me acknowledge from the outset that this is a slightly odd paper. It deals with what may seem like a superficial doubling of the word ‘space’: as both the primary analytic of contemporary human geography and as the popular term for the expanse in which solar and stellar systems are located. To put it succinctly, this paper attempts to apply the insights of the former to pressing ‘geo’-political questions about the latter; it is my intention, in other words, to develop an agenda for a critical geography of outer space. Given how adept geographers have become in thinking philosophically about space, one might expect this to be a relatively modest undertaking. We conceive of space as being produced through social action (Lefebvre, 1990); space as relational (Massey, 2005); space as a site where justice can be addressed (Dikec, 2005). Our analyses of space have been among the most significant advances for the discipline, attracting interest from across the humanities and social sciences. But surely I am not the only geographer who, on trying to explain to the uninitiated that our discipline is no longer about maps, has resorted to ‘space’ as my analytical trump card, only to be met with a quizzical look and a finger pointing upwards: ‘what? you mean... *space?*’. This, I have concluded, is not such a bad question. If this undertaking sounds esoteric, then I hope to demonstrate that it is a lacuna in contemporary geographical scholarship that should be addressed with some urgency. Given that outer-Earth has been a sphere of human endeavour for well over fifty years, a critical geography of space is long overdue. Our presence in, and reliance on, space has become one of the enabling conditions for our current mode of everyday life in the West. And yet it lies, for the most part, outside the orbit of geography. I do not want to put at risk a great deal of our abstract thinking about space as an analytic (elegantly manifest, for instance, in Doreen Massey’s For Space) by setting up the cosmos as some great ‘out there’ (Massey, 2005). It is precisely contemporary human geography’s relational understanding of space that makes it a good disciplinary launch pad for considering the meaning and politics of space exploration. And lest anyone think that what follows are the musings of a sci-fi fantasist, let me make clear that I am not really a fan of the genre. My interests are more down-to-earth: I write as an historical geographer who has come to think about outer space through researching test sites for Cold War rocketry (see MacDonald, 2006). The fact that this paper is written from a modest technical and scientific understanding does not, I hope, constrain the discussion of outer space as a sphere of the social. This essay is borne out of a conviction that what is at stake – politically and geopolitically – in the contemporary struggle over outer space is too serious to pass without critical comment. As the future conquest of space represents a potentially unprecedented opportunity to enact politico-military control on Earth, most plausibly by the world’s only superpower, such an awesome concentration of state power demands scrutiny.

### Critical geopolitics is essential in the context of space.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

This paper sets out to critique the new body of astro-knowledge by engaging the diverse perspectives of critical human geography. One paradox of our current phase of space development is that, unlike the 1960s, popular imagination and interest has not kept pace with technology. We are uncertain as to whether space exploration is a failed modernist dream or a new window into a transcendent future (Benjamin, 2003). In this gap lies a profound ambivalence that may account for why geographers have neglected the celestial realm. In advocating that geography should take outer space seriously, I do not present this as a new direction but rather, in the first section, I frame this project as a return to a much older early-modern tradition of geographical enquiry. In the second section, I consider how the spaces of Earth and Earth’s orbit are co-produced through military strategy, satellite surveillance and the everyday application of space technology. Finally, section three turns to the emerging field of ‘astropolitics’, particularly the work of Everett Dolman, who has sought inspiration from classical geopolitics in order to strategize a future of monolithic American hegemony in outer space (Dolman, 2002).

## **Floating PIK**

### Our motivations are the most important thing to consider in discussions of space exploration—we can endorse their advocacy in the abstract but reject their methods and representations.

Dickens and Ormrod 7 — Peter Dickens, Affiliated Lecturer in the Faculty of Social and Political Sciences at the University of Cambridge and Visiting Professor of Sociology at the University of Essex, and James S. Ormrod, Lecturer in Sociology at the University of Brighton, 2007 ("Capital, outer space and star wars," *Cosmic Society: Towards a Sociology of the Universe*, Published by Routledge, ISBN 0415374324, p. 81)

Ultimately, as Val Plumwood (2001) recognizes in relation to Earthly environmental ethics, we cannot identify cosmic need in a disinterested, asocial way. The universe has no ‘value’ except that ascribed to it by society, for values are social constructs. Tarnas (2006) disagrees strongly with this position, arguing that it only leads to further human self-aggrandizement and a continuing denial of humanity’s spiritual links with the cosmos. An anthropocentric standpoint is, however, inescapable. It does not necessarily entail a view that humans are masters of the universe. Crucially, if the universe is treated with care and respect rather than as a resource to be exploited, there is every hope that the benefits of space exploration and development may be made available to everyone. These values are, in the end, socially and politically made. The values are all inevitably human. And more often than not they are an expression of power relations. This is abundantly clear when we consider the legal rights being demanded by those attempting to own part of the Moon or Mars. Individuals and institutions are straightforwardly attempting to protect their investments. These values are contested by social movements such as the Global Network Against Weapons and Nuclear Power in Space, which, as its name implies, is perfectly clear where its priorities lie. Like this movement, we should return to the Earthly world of political economy if we are to get a more accurate picture of what lies behind the privatization and colonization of outer space. This is not to say that the humanization of outer space is an inherently bad thing. It depends on which interests are doing the humanizing. Perhaps there are some lessons here from Earth to outer space. Privatizing outer space would only enhance the power of the already powerful. This brings us back to our conceptual starting points: Harvey’s notion of ‘spatial fixes’ as solutions to capital’s continuing crises of accumulation, and Gramsci’s notion of hegemony, or rule by consent. Current and future forms of outer space humanization are, under current political and social arrangements, no more and no less than attempts at saving capitalism. But success is not guaranteed. Whether cosmic socio-spatial fixes are profitable or necessary will depend not only on environmental degradation or social crisis on Earth but on making the resources of outer space into a series of successful primary circuits of capital. Such a project could well be made a future hegemonic project, one led by a dominant social and economic bloc. Such ‘fixes’ would offer another promise of staving off capitalism’s tendency towards crisis formation, suitably packaged as a boon to the Earth’s population. At the same time, it is far from clear when and how such fixes will be seriously attempted, what forms they would take and how successful they would be. Needless to say, there is no clear indication that they will resolve the crises of unemployment, poverty and environmental degradation on Earth. If the ‘risk society’ thesis is taken seriously, there is every possibility that such interventions may make matters even worse. But how is the development of space made a ‘common sense’ enterprise?

# ---- Blocks To Aff Responses

## They Say: “Not Policy Relevant”

### Critical theory is a prerequisite to analyzing the space colonization—prefer our issue-specific evidence.

Collis and Graham 9 — Christy Collis, Senior Lecturer in Communication Studies at the Queensland University of Technology, holds a D.Phil. from La Trobe University, and Phil Graham, Director of the Institute for Creative Industries and Innovation and Professor of Communication and Culture at the Queensland University of Technology, holds a Ph.D. from the Queensland University of Technology, 2009 ("Political geographies of Mars: A history of Martian management," *Management & Organizational History*, Volume 4, Number 3, August, Available Online to Subscribing Institutions via SAGE Journals Online)

‘Colonialism’ has a specific meaning here: rather than a vague pejorative portmanteau used to house a myriad of power relations, it refers to the creation of distant land as the property of a metropolitan state, generally for the economic benefit of the colonizer.1 As such, colonialism incorporates expansionist capitalism. Martian colonialism does not begin with the launch of the first exploration ships or at the moment the first rocket touches down on Mars. It begins with ideas, epistemologies, expectations, discourses, and pronouncements, an organizing of the world in a legal, logical, and managerial framework that demands colonization. Martian colonialism is therefore not science fiction fantasy: it has begun in earnest, with m any millions of dollars already invested in its success. There are political, strategic, marketing, and operational plans at work. In his 2004 announcement of the USA’s new space policy, George W. Bush (2004) stated that Mars would be the next body on which the USA’s human presence would be felt. Bush’s Martian vision was not a new development in the USA. Since the 1986 US National Commission on Space’s declaration of its aim to settle on Mars and the Moon, Space colonialism has featured on US Space policy agendas.2 The European Space Agency, similarly, is investing heavily in robotic probes that will scour the Martian surface for optimal colonization sites (BBC 2006). China and Russia announced in March 2007 that they would send a joint mission to Mars by 2009. And in schools around the world, children design Martian colonies as part of their homework, with teachers being trained in how best to bring Mars into the classroom (Middle 2006), and companies offering schools ready‐made Martian exploration simulation programs (Space Explorers 2007). We use the term ‘spatiality’ to refer to the composite nature of any geographical space: it works as a shorthand for the combination of physical, imagined, and epistemological spaces that together comprise a single place. We attend to Martian spatiality for two key reasons. The first motivation driving this study is a straightforward concern with spatial accountancy: what kind of a space is Mars at this moment? What kind of a place is Mars before the work of its physical colonization begins? Can Mars be legally owned, and if so, by whom and through which processes? And are any of the numerous lessons learned from European colonialisms of the past relevant to Mars? And is the future of Mars necessarily colonial? The second motivation is a curiosity about the ways in which geographies are produced as artefacts of systemic trends in political economic terms. Mars presents a unique case for postcolonial spatial analysis: it is precolonial, a space at the threshold of a significant spatial change. It represents an opportunity for postcolonial studies to refocus on the present – and future – tense, and on colonialisms other than those of the European past. Postcolonial spatial theory is an analytical lens through which to view Martian spatiality in its historical character: it allows for a useful view on the cultural construction of the planet, the discursive production of its spatiality, and the ways in which established power groups work to prefigure the planet as an object of capitalist commodification and strategic managerialism. Yet frustratingly, despite the proliferation of postcolonial analyses of past colonial spatialities, when it comes to new colonialisms, there is a curious critical silence. To generalize, postcolonialism tends to figure imperialism and colonialism and their associated spatialities as historical European phenomena from whose ruins nations such as Australia, Indonesia, and Canada have emerged. As Ferro (1997, viii) argues, postcolonialism is inherently Eurocentric because it focuses almost entirely on European empires, European epistemologies, and European spaces of the past. Or as Dodds (2006, 60) points out in his discussion of the difficulty of accommodating contemporary Antarctic colonialisms within existing postcolonial theoretical frameworks, ‘post‐colonial studies are too preoccupied with a linear account of liberation in certain countries’. For example, despite the fact that Australia has laid contentious claim to 42 per cent of Antarctica since 1933 – a claim solely based on acts of imperial exploration and flagraising, and ongoing colonization – the voluminous field of Australian postcolonial studies has refused or failed to acknowledge this situation. A survey of leading postcolonial journals demonstrates this refusal: of the hundreds of articles in these publications, not one deals with Antarctica, and not one addresses Space.3 And while there are clear similarities between past and present colonialisms, the planned colonization, exploration, and spatial production of Mars are decidedly unlike British practices of the last few centuries. But this does not automatically eliminate Mars from the field of colonial spatiality.

## They Say: “Our Tech Is Good”

### Technology is not intrinsically militaristic, but we must comprehensively question the assumptions and rationale behind civilian infrastructure in space.

MacDonald 7 — Fraser MacDonald, Lecturer in Human Geography at the School of Anthropology, Geography and Environmental Studies at the University of Melbourne, 2007 ("Anti-Astropolitik – outer space and the orbit of geography," *Progress in Human Geography*, Volume 31, Number 5, Available Online to Subscribing Institutions via SAGE Publications Online)

I should emphasise that I am not advancing some technologically determinist argument to the effect that if something is military in origin it is somehow ‘tainted’ or forever in the service of militarism. Walter Benjamin reminds us that the meaning of technology has no umbilical link to its origins: he noted that the Eiffel Tower ‘found’ its purpose as a military radio transmitter long after it had been built simply as a monument to industrial confidence in iron (Benjamin, 1999: 568). But we should be concerned when the needs of basic civilian infrastructure come to be regarded as coterminous with those of military strategy, particularly in circumstances when technologies of the state are so readily adaptable to monitoring the lives of its citizenry. Another consequence of this conflation is that dual-use systems underpinning normal life have become a ready target of military efforts, being exempt from the usual civilian protections of international law (Graham, 2005c). To use Stephen Graham’s phrase, US air and space power is increasingly aimed at ‘switching cities off’ (Graham, 2005c). This may very easily develop from targeting electricity networks (Belgrade, Baghdad, Beirut) to the destruction of satellite provision on which so much of our civilian infrastructure depends. As Tim Luke observed, many more human beings live highly cyberorganized lives, totally dependent upon the Denature of machinic ensembles with their elaborate extra-terrestrial ecologies of megatechnical economics. This is true for the Rwandans in the refugee camps of Zaire [sic] as it is for the Manhattanites in the luxury coops of New York City (Luke quoted in Graham 2005c: 171) I am reluctant to reiterate Paul Virilio’s preoccupation with the crash and the accident as defining features of modernity (Virilio, 2000; Leslie, 2000). But one cannot avoid the fact that systems that have become vital for sustaining our current mode of existence are now obvious and accessible targets. Concerns have even been raised that constellations of satellites are vulnerable to hackers with destructive intent (Kent, 2006). The point of all this gloomy talk is to qualify rather than to overturn the emphases of Nigel Thrift’s recent work. Moreover I hope to contextualise some of the tendencies Thrift describes within the systems of geo-power from which they have materialized. In the final section I want to show something of the strategic struggle for space; a struggle that is by no means distant from the discipline of geography.

# Materials Shared Between Critiques

## Framework Cards

### Critical theory is essential in the context of space—problem-solving theory alone dooms us to serial policy failure.

Collis 9 — Christy Collis, Senior Lecturer in Communication Studies at the Queensland University of Technology, holds a D.Phil. from La Trobe University, 2009 ("The geostationary orbit: a critical legal geography of space's most valuable real estate," *The Sociological Review*, Volume 57, Issue Supplement 1, May, Available Online to Subscribing Institutions via Wiley Online Library)

The chapter is grounded in two theoretical approaches: cultural geography, and critical legal geography. The chapter is framed by the cultural geographical concept of ‘spatiality’, a term which signals the multiple and dynamic nature of geographical space. As spatial theorists such as Henri Lefebvre assert, a space is never simply physical; rather, any space is always a jostling composite of material, imagined, and practiced geographies (Lefebvre, 1991). The ways in which cultures perceive, represent, and legislate that space are as constitutive of its identity – its spatiality – as the physical topography of the ground itself. The second theoretical field in which this chapter is situated – critical legal geography – derives from cultural geography's focus on the cultural construction of spatiality. In his Law, Space and the Geographies of Power (1994), Nicholas Blomley asserts that analyses of territorial law largely neglect the spatial dimension of their investigations; rather than seeing the law as a force that produces specific kinds of spaces, they tend to position space as a neutral, universally-legible entity which is neatly governed by the equally neutral ‘external variable’ of territorial law (Blomley, 1994: 28). ‘In the hegemonic conception of the law,’Pue (1990: 568) similarly argues, ‘the entire world is transmuted into one vast isotropic surface’ on which law simply acts. But as the emerging field of critical legal geography demonstrates, law is not a neutral organizer of space, but is instead a powerful cultural technology of spatial production. ‘Rather than seeking to bridge the gap between law and space, the argument here is that there is no gap to bridge,’ Blomley explains (Blomley, 1994: 37). Or as Delaney (2001: 494) states, legal debates are ‘episodes in the social production of space’. International territorial law, in other words, makes space, and does not simply govern it. Drawing on these tenets of critical legal geography, as well as on the Lefebvrian concept of multipartite spatiality, this chapter does two things. First, it extends the field of critical legal geography into Space, a domain with which the field has yet to substantially engage. Second, it demonstrates that the legal spatiality of the GEO is both complex and contested, and argues that it is crucial that humanities scholars understand this dynamic legal space on which the Earth's communications systems rely. Thinking carefully and critically about the legal geography of the GEO is important, and increasingly urgent. One aspect of this importance is entirely practical: most of our communications, meteorological, and navigational systems depend upon satellites in the GEO: it is no understatement to say that global communication and navigation now depends on the GEO. As Warf (2007: 385) notes, ‘satellites and earth stations comprise a critical, often overlooked, part of the global telecommunications infrastructure’. Castells's (2007: 394) ‘space of flows,’ he continues, ‘would be impossible without the skein of earth stations and orbital platforms that lie at the heart of the [satellite] industry’. In an article on the astropolitical environment, MacDonald (2007: 594) similarly notes that ‘our lives already extend to the Outer-Earth in ways that we entirely take for granted’. Parks (2005: 7) describes satellites as ‘moving persistently through orbit, structuring the global imaginary, the socioeconomic order, and the tissue of everyday experience across the planet’. Accordingly, the satellite industry – one which is largely centred in the desirable GEO – has become an increasingly powerful component of global economies: satellite world revenues in 2004 were $103US billion, and were predicted to exceed $158US billion by 2010 (Jakhu, 2007: 176). Understanding the GEO – and in particular its legal geography – is thus critical to understanding how the very infrastructure of world communication works. Understanding the legal geography of the GEO is also of particular importance to cultural theorists. As the previous paragraph indicates, for media and communication scholars – or for anyone with an interest in communication – understanding the legal geography of the GEO is fundamental: the GEO is the space – physical and legal – which allows contemporary communication practices to exist. For cultural theorists concerned with the creation of social spaces, with the ways in which ideological forces produce the social and material world, or with the ways in which cultures interact with and shape their environments, the GEO is of profound salience. Yet disturbingly little scholarship on Space exists inside what can roughly be called the humanities: despite the demonstrated ability of humanities scholars – cultural geographers, critical legal geo-graphers, media and communication scholars, cultural studies scholars in particular – to understand and explain cultural, historical, and political phenomena, when it comes to Space, there is a curious critical silence (see Parker and Bell, this volume). As Parks (2005: 5) notes, ‘Despite the global significance of satellite technologies, cultural theorists have been relatively silent about their ramifications.’MacDonald (2007: 610) makes a similar argument, noting that for many humanities scholars, Space seems too absurd, odd, and abstract a subject with which to engage: this assumption, however, is a direct result of lack of understanding of the centrality of Space – and in particular the GEO – to everyday life. My experience as a Space cultural theorist demonstrates that this lack of understanding at times leads to condemnation of Space scholarship: when people are starving on Earth, I've been scolded, how can you morally justify sitting around thinking about Outer Space? Yet as this chapter – and this book – signal, Space is imbricated into our lives, our social organization, our cultures, and the power politics of the world: ‘what is at stake – politically and geopolitically – in the contemporary struggle over outer space is too serious to pass without critical comment’ (MacDonald, 2007: 593), and is too serious to be left to engineering, scientific, and legal scholars alone. ‘In cultural theory the satellite has been missing in action, lying at the threshold of everyday visibility and critical attention’ (Parks, 2005: 7): it is time then for cultural theorists to extend their analytical skills, their attention, and their distinct critical perspectives beyond the surface of the Earth. This is not a chapter about what kind of a space I think the GEO should be, or how I think it should be created as a legal geography. Similarly, this chapter is not a recondite philosophical argument about the nature of spatiality. Instead, this chapter provides an anatomy of the legal geography of the GEO, a spatial history (Carter 1987) of this valuable and contested site on which we now rely. It is expository rather than argumentative for one key reason: few humanities and social science scholars are aware of the existence of the GEO itself, let alone its complex cultural history and constitution. Before debates about the GEO can be initiated, and before humanities scholars can lend their critical thoughts and insights to the struggle for the GEO, the GEO first needs to be understood and anatomized. To do so is the purpose of this chapter.

### Space policy debates that do not address the issue of securitization are impoverished—it’s a core question.

Peoples 10 — Columba Peoples, Lecturer in International Relations in the School of Sociology, Politics and International Studies at the University of Bristol, holds a Ph.D. from the University of Wales, 2010 ("The growing ‘securitization’ of outer space," *Space Policy*, Volume 26, Issue 4, November, Available Online to Subscribing Institutions via ScienceDirect)

Attempts at securitization are thus a rapidly growing feature of contemporary space policy discourse. Merely making this observation, however, leaves aside the question of whether such securitizing moves should be encouraged or avoided by policy makers and analysts. On the one hand, the idea of space as a key part of the ‘connective tissue’ that binds global security might seeman attractive proposition to those seeking to shift the emphasis away from militaristic national concerns. In this light, attempts to securitize environmental monitoring, critical infrastructure and economic prosperity under the rubric of space security might be welcomed as the basis for a moremultilateral, cooperative global approach. On the other hand, there is a legitimate concern that the securitization of space policy effectively acts as a Trojan horse for the expansion of nationale military interests. One previous viewpoint contributor contends in relation to EU space policy that ‘.Europe’s “security research” has slowly pavedtheway for the introductionofmuchmore controversial “military research” within the European domain’14, and Manriquez suspects that, with Japan’s space law revision, ‘the nation inches [further] towards re-militarization with the likely opening of space formilitary use.’15 Similarly, the new space policy of the Obama administration appeals simultaneously to an expansive definition of global security and a more narrow, traditional focus on the nationalemilitary interest of the USAincluded within this. All of this points to the importance of taking the securitization of space policy seriously as a key element of debates on space security. Focusing on militarization and weaponization alone simply isn’t sufficient.

### Policymaking alone is inadequate—incorporation of critical theory is key to space policy debates.

Grondin 9 — David Grondin, Lecturer in the School of Political Studies at the University of Ottawa, holds a Ph.D. in Political Science from the University of Quebec at Montreal, 2009 ("The (power) politics of Space: The US astropolitical discourse of global dominance in the War on Terror," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

As a critical poststructuralist attitude, critical geopolitics is itself a strategy that looks carefully at "the particular historicity and spatiality of the deployment of geopolitics as an indeterminate but nevertheless congealed form of power/knowledge. … [It is a] geneaological approach to the problematic of the writing of global space by intellectuals of statecraft" (Ó Tuathail 1996:143). It critically scrutinizes the "strategic surveyor's perspective of the foreign policy 'experts'" (Ó Tuathail 1996:69). Conversely, the language of policymaking does not simply reflect "real" policy issues and problems; rather, it actively produces the issues with which policymakers deal and the specific problems that they confront. Geopolitics is seen as a discursive practice that tells how the world is thought, described, spatialized and written, as well as how these narratives work as political discourses (re)producing "reality". Critical geopolitics is therefore interested in addressing the hidden problems that are influenced by geo-politics (i.e. the relationship of power, space and politics), and which lie behind the scripting of global space: it seeks to destabilize the fixed presence, to question, and to be a question that critically assesses the bonding of "geo" and "politics" (Ó Tuathail 1996:66–67; Agnew 2005:160–161).

## **Self-Fulfilling Prophecy**

### K takes out the case –drive for securitization is the root cause of insecurity, the drive for full spectrum dominance fails.

Webb 9 — Dave Webb, Professor of Engineering Modelling, Head of the Centre for Applied Research in Engineering, and Associate Director of the Praxis Centre—a multidisciplinary research centre for the 'Study of Information Technology for Peace, Conflict and Human Rights'—at Leeds Metropolitan University, holds a D.Phil. in Space Physics from the University of York, 2009 ("Space Weapons: Dream, Nightmare or Reality?," *Securing Outer Space: International Relations Theory and the Politics of Space*, Edited by Natalie Bormann and Michael Sheehan, Published by Routledge, ISBN 0415460565, p. kindle)

War in space is undesirable for a number of reasons – not least of which are the problems associated with space debris and the possibility of space-based weapons aimed at Earth – and most nations appear to be united in wishing to prevent weapons being stationed in space. However, the US is determined not to give up its superiority and dominance in space technology and has consistently prevented progress in treaty negotiations and has in fact led space weapons development through missile defence and other programmes claiming them to be defensive rather than offensive. However, offence is often in the eyes of the beholder and other technologically capable (or near capable) states are concerned about the dominance and aggressive stance of the US in this area. A major question often asked is what is the force behind the US drive to space dominance? How do major projects get huge amounts of funding when eminent scientists can show that they are not technically feasible? Are concerns about national security and a national faith in technological solutions to national and global problems too strong in the US? Does the drive come from a desire for world domination and control? Perhaps it is a mixture of many things. Certainly the aerospace and defence industry (and, increasingly, academia) is a major beneficiary in the effort to achieve 'full spectrum dominance'. It has been at the forefront of the development of a philosophy of security through strength with a role for the US as a global police force through technological superiority. This also fits well with some US right-wing political views concerning the destiny of America as world police and the Americans' trust in technology to eventually find solutions to seemingly insoluble problems. Another possible influence on all this is a continuing decline in non-military public support for science and engineering programmes and training. The increasing reliance on industry to support military activities has meant that high technology projects in universities are often linked to military programmes. Students and groups such as the Scientists for Global Responsibility in the UK and the Union of Concerned Scientists in the US actively campaign on issues such as the ethical use of science and engineering and continue to lobby politicians but there has been little positive response from government. Therefore, there is little choice for those wanting to follow a career in engineering or science but to become an integral part of the 'military industrial complex' and contribute to the development of lucrative military projects. Now must be the time for scientists, engineers and politicians to seriously consider what might constitute a workable ethical policy on space. Although fears are that it is already too late. At a time when satellite and missile-related technologies are growing rapidly, an international space weapons race cannot be the path to follow. Many nations and NGOs agree on a number of issues, including the desirability of the ethical and sustainable use of space. A truly secure future can only be guaranteed if space remains weapon free and the increasing development of military-related space systems is limited (or ideally reversed) and rigorously monitored and controlled. If there is the will then it can be done. There is a significant role for the technologically able nations here. The world is seeing the warnings and suffering the consequences of ill-planned technological growth. Global warming is beginning to be taken seriously by the major energy and resource consumers. Urgent action is needed to prevent global disaster. Ignoring the environmental consequences of our actions is not an option and often results in human misery and suffering. A significant step for humanity would be made if the nations of the world could develop a collective dream, a meaningful respect and trust that would enable an international agreement on the prevention of the weaponisation of space to be reached. To care enough to make a space environment free of war a reality.

## Reps Key in Space Debates

### Representations are uniquely key in debates about space policy—narratives shape the way we understand harms and solutions.

Redfield 2 — Peter Redfield, Associate Professor and Associate Chair in the Department of Anthropology at the University of North Carolina at Chapel Hill, 2002 ("The Half-Life of Empire in Outer Space," *Social Studies of Science*, Volume 32, Number 5-6, October-December, Available Online to Subscribing Institutions via SAGE Publications Online)

I want to underscore three observations about these two famous moments of space fantasy. The first is simply an affirmation of deep rhetorical connections between exploration above and below the atmos- phere. Despite the particularities of the cultural imagination displayed in them, when taken together these two works remind us of the greater narrative inertia inside the drive for adventure. While focus shifts to a wondrous horizon, and new, exacting techniques of exploration such as rockets and astronomical navigation, the field of vision retains earthly assumptions, desires and fears. As interesting as what each set of explorers seeks in the moon is what they bring with them: frock coats and a sense of civilization on the one hand, and campfire sweaters and a lust for profit on the other. The material is there for an effort to ‘provincialize’ these fictions by revealing the specificity of their historical debts. Such a project would remain a scholastic exercise, however, and well within the bounds of the literary end of postcolonial studies, were it not for the uncomfortable fact that these fictions provided space exploration with a recognizable future, and thus helped engender fantastic practices. These dreams found engi- neers, eager to materialize them. My second observation is about the form of colonization being im- agined: like the occupants of Verne’s projectile for whom the ‘Selenites’ are ultimately superfluous, or Lang’s heroic protagonist who stays behind on the moon, the history of space representation is full of visions of settler colonization. This point is not surprising, given the narrative topology of any act of leaving the earth or extending human life through the galaxy, but it has effects when placed next to the fissures of terrestrial history. Even the planners of the German V-2 dreamed beyond their engines of destruction, imagining an era of peaceful exploration, while American and Soviet cold warriors alternated geopolitical fears of final conflict with calls to embrace a new dawn for humanity.19 Amid explicitly imperial tropes of representa- tion, space offered the prospect of a renewed form of settlement, this time into a zone safely free from human difference. Returning to etymological roots, humans could find new domains to culture, together, as a species.20 By considering the earth as a planetary entity, then, fantasies of space exploration have presented a ‘limit case’ of one measure of scale. Within them – and their potential realization – the atmosphere serves as the threshold of human unity. My final observation involves a potential dynamic of representation created by the interaction of the first two points. Like Verne’s protagonists, committed to their trajectory and inventing a goal on the fly, the language of space exploration returns to history post hoc, within a planetary frame implying common humanity. Thus it should come as no surprise that the sense of history commonly invoked in space narratives is a species narra- tive, full of giant leaps. Here we have a variation of Chakrabarty’s dilemma, only posed in scalar, rather than chronological terms. Just as European history naturally defines the categories of modernity by virtue of precedence, outer space naturally defines the globe by virtue of bounding it. Those people claiming this new realm seem to leave old ones – at least their more unpleasant details – behind. Such a space fantasy involves ‘scale’, both in the sense of a motion of expansion and the sense of establishing a boundary. It is consequently impatient with concerns that remain local (the actual lives of any Selenites), or ultimately earthly (the calculations of Lang’s financiers). Space is a higher calling. In order to interrogate the continued resonance of this higher calling on the ground, moving from general discourse more deeply into specific practice, I will shift closer to the material present and briefly sketch a tropical outpost of high technology.

## They Say: “Extinction First”

### Humanity should prioritize non-existential threats—problems on Earth are more urgent and require solutions, not escape plans.

Williams 10 — Lynda Williams, Faculty in Engineering/Physics at Santa Rosa Junior College, 2010 (“Irrational Dreams of Space Colonization,” *Peace Review: A Journal of Social Justice*, Volume 22, Issue 1, Available Online to Subscribing Institutions via Taylor & Francis Online, p. 4-5)

According to scientific theory, the destruction of Earth is a certainty. About five billion years from now, when our sun exhausts its nuclear fuel, it will expand in size and envelope the inner planets, including Earth, and burn them into oblivion. So yes, we are doomed, but we have five billion years, plus or minus a few hundred million, to plan our extraterrestrial escape. The need to colonize the moon or Mars to guarantee our survival is not pressing. There are also real risks due to collisions with asteroids and comets, although none are of immediate threat and do not necessitate extraterrestrial colonization. There are many Earth-based technological strategies that can be developed in time to mediate such astronomical threats, such as [end page 4] gravitational tugboats that drag the objects out of range. The solar system could also potentially be exposed to galactic sources of high-energy gamma ray bursts that could fry all life on Earth; any moon or Mars base would face a similar fate. Thus, human-based colonies on the moon or Mars would not protect us from any of these astronomical threats in the near future. Life on Earth is more urgently threatened by the destruction of the biosphere and its life-sustaining habitat due to environmental catastrophes such as climate change, ocean acidification, disruption of the food chain, bio-warfare, nuclear war, nuclear winter, and myriads of other manmade doomsday possibilities. If we accept these threats as inevitabilities on par with real astronomical dangers and divert our natural, intellectual, political, and technological resources from solving these problems into escaping them, will we be playing into a self-fulfilling prophesy of our own planetary doom? Seeking space-based solutions to our earthly problems may actually exacerbate the planetary threats we face. This is the core of the ethical dilemma posed by space colonization: should we put our resources into developing human colonies on other worlds to survive natural and manmade catastrophes, or should we focus all of our energies on solving and mitigating the problems that create these threats on Earth?

### Focusing on existential risk means humanity turns a collective blind eye to actually existing worldly problems—resolving these “ordinary” harms is a prerequisite to resolving existential ones.

Williams 10 — Lynda Williams, Faculty in Engineering/Physics at Santa Rosa Junior College, 2010 (“Irrational Dreams of Space Colonization,” *Peace Review: A Journal of Social Justice*, Volume 22, Issue 1, Available Online to Subscribing Institutions via Taylor & Francis Online, p. 4-5)

We have much to determine on planet Earth before we launch willy-nilly into another space race that would inevitably result in environmental disaster and include a new arms race in the heavens. If we direct our intellectual and technological resources toward space [end page 7] exploration without consideration of the environmental and political consequences, what is left behind in the wake? The hype surrounding space exploration leaves a dangerous vacuum in the collective consciousness of solving the problems on Earth. If we accept the inevitability of the destruction of Earth and its biosphere, then it is perhaps not too surprising that many people grasp at the last straw and look toward the heavens for solutions and a possible resolution. Many young scientists are perhaps fueling the prophesy of our planetary destruction by dreaming of lunar and/or Martian bases to save humanity, rather than working on the serious environmental challenges that we face on Earth.

## They Say: “Overview Effect”/”Space Good”

### The desire for an overview perspective negates individual agency—the aff reduces life to a meaningless form.

Redfield 2 — Peter Redfield, Associate Professor and Associate Chair in the Department of Anthropology at the University of North Carolina at Chapel Hill, 2002 ("The Half-Life of Empire in Outer Space," *Social Studies of Science*, Volume 32, Number 5-6, October-December, Available Online to Subscribing Institutions via SAGE Publications Online)

What then to say about those space enthusiasts, dreaming of their extra- terrestrial networks? By surpassing the globe would they really leave it behind? In an essay first written in the midst of Space Race fervour, Hannah Arendt (1978 [1968]) wonders what the ‘conquest of space’ might do to the ‘stature of man’. Her hope is for a renewed appreciation of the earth as ‘the centre and home of mortal men’, and a recognition of ‘factual mortality’ among the conditional limits framing science. Her fear is of a reduction of technology to a biological process, and language to the ‘extreme and in itself meaningless formalism of mathematical signs’ which would not merely lower the ‘stature of man’ but actively destroy it [Arendt (1978 [1968]): 279–80]. Amid its anachronistic language and European humanist frame, the essay identifies a crucial aspect of space exploration: the promise of achieving an Archimedean point of sorts, a position beyond the earth from which to survey the planet itself, a location with clear relational implications. The prospect worries Arendt, for she sees the promise as an incomplete one that will be falsely read as an affirmation of power and a transcendence of limits. Once beyond the atmosphere, humans would imagine themselves to be beyond themselves, and thus lose sight of where they are.49 Quoting Franz Kafka, Arendt writes that man ‘found the Archimedean point, but he used it against himself; it seems he was permitted to find it only under this condition’ [Arendt (1978 [1968]): 278].50 Four decades later, thinking about a small road in the tropics, Arendt’s fears read somewhat differently. For all of the dreams of the world’s space agencies, the mythic allusions in rocket and programme names, the indom- itable enthusiasm of space aficionados, the multiple imagination of science fiction, and even the farce of the world’s first space tourist, human spaceflight has yet really to move beyond the earth. In the absence of the sure reflection of either a god or an alien above, meaning is still measured from below.51 The point is not simply abstract. As the sky fills with satellites, the prospect of extraterrestrial perspective actively materializes, allowing the production and consumption of distinctly global images in support of such diverse causes as corporate profits, environmental awareness and sustainable development. At the same time, however, the import of Kafka’s phrase shifts along with the expanding field of vision. For whom and against whom has this partial transcendence been used – which humans and nonhumans, when and where? Surely the legacy of imperial vision must be incorporated in the act of looking down. Surely past perspectives of differing elevations, past patterns of contest and association are not simply translated or combined. Under the bright light of a higher lens, the ‘man’ of Arendt’s essay splits asunder, not only through the acceleration of instrumental reason and its lurch beyond the atmosphere, but also through the widening and lowering of a frame of historical reference to include human difference. However much astronauts may still try to birth a singular human in the sky, that new being faces multiple demands of ancestry.