The Evolution of the US Ballistic Missile Defence Debate 1989-2010

Institutional Rivalry, Party Politics, and the Progression Towards Political and Strategic Acceptance

By

Andrew James Futter

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Department of Political Science and International Studies,
College of Social Sciences,
The University of Birmingham,
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Abstract

This thesis explains the complex evolution of US ballistic missile defence (BMD) policy between 1989 and 2010, and moves beyond the political rhetoric and intellectual obfuscation that surrounds the policy in much of the literature. By developing an explanatory framework to rigorously and systematically analyse the impact of different dynamics on policy, it explains the rhythms of day-to-day policy in particular context; explains the medium-term shifts in the domestic political space within which the day-to-day policy debate occurred, and explains the long-term move towards acceptance and the gradual normalisation of BMD in American security policy. The primary argument of the thesis is that the particular configuration of domestic political institutions and party political pressures at any given time has been far more important in shaping BMD policy during each presidential administration since the end of the Cold War than has previously been acknowledged. Secondly, it argues that developments in the international system and technology have gradually altered the context within which this domestic political debate has occurred. Finally, it shows that domestic political influences, and the gradual shift in the contours of the domestic debate are the key reasons why BMD has gone from being one of the most divisive, zero-sum political issues in American national security thinking, to something that has largely become normalised, with debate now only occurring at the margins.

This thesis is dedicated to my late father, John Futter.

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Andrew Futter

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Contents

Glossary

Anti Ballistic Missile (ABM) Treaty	Treaty between the United States and the Soviet Union, limiting the deployment of national missile defences (1972 – 2002).
Aegis BMD	Sea-based missile defence system.
Accidental Launch Protection System (ALPS)	Missile defence plan proposed by Senator Sam Nunn in 1988.
Ballistic Missile Defense Organisation (BMDO)	Agency responsible for the US BMD programme (1993 - 2002).
Brilliant Pebbles	Space-based component of the GPALS system.
Exoatmospheric Reentry-vehicle Interception System (ERIS)	The ground-based component of the SDI and GPALS system.
Global Protection Against Limited Strikes (GPALS)	BMD architecture unveiled by George H. W. Bush in January 1991.
Ground-based Interceptor (GBI) missile	The successor to the ERIS missile, designed to intercept long-range missiles in space.
Ground-based Midcourse Defense (GMD)	System to shoot down ICBM's while travelling through space.
Intercontinental Ballistic Missile (ICBM)	A missile capable of travelling a distance of 3,500m or greater, which can be armed with nuclear warheads.
International Atomic Energy Agency (IAEA)	International organisation for the peaceful use of nuclear energy.
Missile Defense Agency (MDA)	Agency responsible for the US missile defence programme (2002 -).
National/ Strategic Missile Defense (NMD)	A missile defence system designed to protect the US homeland.

New START Treaty	Treaty between the United States and Russia (February 2011 -).
Patriot BMD	Battlefield BMD system for use against short-range missiles.
Phased Adaptive Approach (PAA)	Missile defence plan for Europe announced by Barack Obama in 2009.
Phase I Strategic Defense System (SDS)	BMD deployment plan outlined by Ronald Reagan in 1987.
Standard Missile 3 (SM-3)	Interceptor missile used by the Aegis BMD for short-intermediate range interception.
Strategic Arms Reduction Treaty I (START I)	Treaty between the United States and Russia, (1991 - 2009).
Strategic Arms Reduction Treaty II (START II)	Treaty between the United States and Russia (2000 - 2002).
Strategic Defense Initiative (SDI)	Programme to develop missile defences, announced by President Ronald Reagan in 1983.
Strategic Defense Initiative Organization (SDIO)	Organisation responsible for the US missile defence programme (1983 - 1993).
Strategic Offensive Reductions Treaty (SORT)	Treaty between the United States and Russia (2003 - 2011).
Tactical/ Theatre/Battlefield missile defence (TMD)	BMD systems designed to defend against short to intermediate range missiles.
Terminal (Theatre) High Altitude Area Defense (Thaad)	Ground-based BMD system designed to intercept missiles interminal phase of flight.
The Third Site plan	Bush administration’s plan to deploy missile defence assets in Europe (2006 - 2009).

Cast of Characters

Mahmoud Amadinejad	President of Iran (2005 – present).
Les Aspin	United States Secretary of Defense (1993 – 1994).
James Baker	United States Secretary of State (1989 – 1992).
Robert Bell	Aide to Senator Sam Nunn (1984 – 1993); Special Assistant to the President (1993 - 1999).
George H. W. Bush	President of the United States, (1989 – 1993).
George W Bush	President of the United States, (2001 – 2009).
Stephen Cambone	United States Department of Defense Director of Strategic Policy (1990 – 1993); United States Under-Secretary of Defense for Intelligence, (2003 – 2007).
Dick Cheney	United States Secretary of Defense, (1989 – 1993); Vice President of the United States, (2001 – 2009).
William ‘Bill’ Clinton	President of the United States, (1993 – 2001).
William Cohen	Republican United States Senator from Maine, (1979 – 1997); United States Secretary of Defense, (1997 – 2001).
Ambassador Henry Cooper	Director of the United States Strategic Defense Initiative Organization, (1990 – 1993).
John Conyers	Democratic member of the United States House of Representatives from Michigan, (1965 – present).
Frank Gaffney Jr.	Founder and president of the Center for Security Policy.
Robert Gates	United States Director of Central Intelligence (1991 –1993); United States Secretary of Defense (2006 – 2011).

Newt Gingrich	Republican Speaker of the US House of Representatives from Georgia, (1995 – 1999).
Mikhail Gorbachev	Leader of the Soviet Union, (1985 – 1991).
Al Gore	Vice President of the United States, (1993 – 2001).
Lt Gen Ronald Kadish	Director of US Ballistic Missile Defense Organisation, (1999 – 2004).
John Kyl	Republican member of the United States House of Representatives, (1987 – 1995); Republican United States Senator from Arizona (1995 – present).
Carl Levin	Democratic United States Senator from Michigan, (1979 – present)
Lt Gen Lester Lyles	Director of the US Missile Defense Agency, (1996 – 1999).
Dmitri Medvedev	President of Russia, (2008 – present).
Sam Nunn	Democratic United States Senator from Georgia (1972 – 1997).
Barack Obama	President of the United States, (2009 – present).
Lt Gen Henry Obering	Director of the US Missile Defense Agency, (2004 – 2008).
Lt Gen Malcolm O'Neill	Director of the Ballistic Missile Defense Organisation, (1993 – 1996).
Lt Gen Patrick O'Reilly	Director of the US Missile Defense Agency, (2008 – present).
William Perry	United States Secretary of Defense, (1994 – 1997).
Vladimir Putin	President of Russia, (2000 – 2008); Prime Minister of Russia, (2008 – present).
Dan Quayle	Vice President of the United States, (1989 – 1993)
Ronald Reagan	President of the United States, (1981 – 1989).
Donald Rumsfeld	United States Secretary of Defense, (2001 – 2006).
Brent Scowcroft	United States National Security Adviser (1989 – 1993).
Strobe Talbot	United States Deputy Secretary of State, (1994 – 2001).
Boris Yeltsin	President of the Russian Federation, (1991 – 1999).

Introduction

The idea of constructing a missile shield capable of defending the United States, its troops overseas, and its allies from the threat of ballistic missile attack has been part of the US national security debate since the 1940s.[1] It has also, until recently, been a distinctively American phenomenon.[2] Successive US administrations have now spent several hundred billion dollars in the pursuit of technologies designed to provide a leak-proof missile shield over the United States and return the nation to the seeming invulnerability enjoyed before World War Two. It has only been recently – in the words of the US Missile Defense Agency's Lawrence Kaplan – "that the US appears to have crossed the threshold between technological capability and the BMD concept, more than 60 years after it was first introduced".[3]

Unlike many other national security programmes, missile defence has been mired in political, technological and strategic controversy, and has been the subject of fierce debate over the years, which has often been described as "theological". In fact, as one commentator points out:

> America's on-again, off-again argument with itself – and with the rest of the world – over whether to build a defense against intercontinental-range ballistic missiles (ICBMs) is in a class by itself. No other proposed weapon system has fuelled such intense debate.[4]

Although the debate, technology and rationale has shifted considerably since the idea was first conceived, the programme remains in the words of John Isaacs – Director of the Washington, DC-

[1] For a historical overview of US missile defence policy see Donald Baucom, "*The origins of SDI: 1944-1983"*, (Kansas, Kansas University Press: 1992); Richard Burns & Lester Brune, "*The quest for missile defenses 1944-2003",* (California, Regina Books: 2003); Ernest Yanarella, "*The missile defense controversy: technology in search of a mission"*, (Kentucky, University Press of Kentucky: 2002). For an overview of ballistic missile defence as a component of nuclear strategy see Lawrence Freedman, *"The evolution of nuclear strategy",* (Basingstoke, Palgrave Macmillan: 2003) or Sanford Lakoff, *"Strategic defense in the nuclear age",* (London, Praeger Security International: 2007).

[2] As Bradley Graham points out: "The human yearning for invulnerability is as old as Greek mythology and the aegis cloak of Zeus. But the particular ambition to shield a nation against ballistic missile attack has been a distinctly American experience". Bradley Graham, "*Hit to kill: the new battle over shielding America from missile attack",* (New York, Public Affairs: 2003) xxvi

[3] Interview with Lawrence Kaplan (14th June 2010)

[4] Ibid

based Council for a Livable World – "inherently and fundamentally political"[5], and continues to be used as a tool in party political power struggles

For the best part of six decades, the desirability, feasibility and affordability of constructing ballistic missile defences has fundamentally split domestic opinion in the United States, and has resulted in the programme becoming one of the most politically divisive issues in US national security thinking. Very few other government programmes have had such ability to unite politicians and commentators according to political creed and to produce such politically and ideologically charged arguments. There have essentially been two main areas of disagreement. First, and especially since the late 1960s, opinion has been split over the role of BMD in nuclear deterrence. On one side of the debate, there are those who view BMD as inherently destabilising in international nuclear relationships, and who have therefore favoured a policy of restraint, whereby US security is based on the acceptance of vulnerability rather than defence, a doctrine known as Mutual Assured Destruction (MAD). On the other side, there have been those who believe missile defences are integral to US security, are convinced that relying on vulnerability is morally wrong and strategically dangerous, and that the US should pursue all means possible to protect American citizens. Second, the debate has been split over technology and the question of what it might be feasible to expect a ballistic missile defence system to do. This has been divided between technological optimists who view any deployment as good, and believe all that is lacking is political commitment, and technological pessimists who neither believe the technology works nor feel that the price of pursuing its development is worthwhile. It is also split between those who believe that missile defences must be 100% effective and those that believe any capability is worth having. As Stephen Cambone would later point out: "there has been overestimation on both sides about the

[5] Interview with John Isaacs (19th July 2010)

technology, and these were often subjected to Cold War orthodoxies about Mutual Assured Destruction".[6]

At least since the early 1980s, and in particular Ronald Reagan's 1983 announcement of the Strategic Defense Initiative (SDI), this split has been formulated largely along party political lines. Republican lawmakers and a small group of conservative think tanks have generally supported more funding and an expanded role for missile defences and can be thought of as "missile defence supporters", whereas Democrats and "arms controllers" have been more sceptical of the programme and can be thought of as "missile defence sceptics". This dynamic has largely held true on both presidential and Congressional levels since the unveiling of the Strategic Defense Initiative in 1983. Missile defence supporters have tended to place less faith in ensuring US security through Mutual Assured Destruction (MAD) – such as through the 1972 Anti-Ballistic Missile (ABM) Treaty – and instead have seen programmes such as missile defence as a moral obligation. Sceptics on the other hand have tended to see national security as best assured through the mutual vulnerability codified by MAD, and have therefore been far keener to limit missile defences and rely primarily on nuclear deterrence as the bedrock of US security. The result of this split is that Republicans have tended to be more disposed towards "strategic" or national missile defences (NMD) prohibited by the ABM Treaty (even though the Treaty was signed by a Republican president)[7], while Democrats have tended to prefer theatre, tactical or battlefield missile defences (TMD), which do not represent a challenge to the perceived logic of Mutual Assured Destruction. During the second half of the Cold War – for a mixture of political, technological and strategic reasons – the idea that US security was best assured through a policy of Mutual Assured Destruction and by limiting US missile defences was the dominant and accepted discourse.

[6] Interview with Stephen Cambone (5th August 2010)

[7] Republican President Richard Nixon and Soviet General Secretary Leonid Brezhnev signed the ABM Treaty on 26th May 1972. The Treaty essentially codified the condition of Mutually Assured Destruction by ensuring that neither side could deploy nationwide "strategic" defences. For more on this see Matthew Bunn, *"Foundation for the future: the ABM Treaty and national security",* (Washington DC, Arms Control Association: 1990).

What makes the period looked at in this thesis of particular interest were the fundamental changes that occurred in the US missile defence debate. The years 1989-2010 saw a gradual transformation from the disagreements that dominated strategic planning during the Cold War – whereby MAD was preferred to missile defences, which were limited within the ABM Treaty – to a position whereby various systems had been deployed, the ABM Treaty had been abrogated, and both tactical and national missile defences had become an accepted component of US national security planning. Although the debate remained political during this period, by 2010 lawmakers and commentators previously sceptical of deploying missile defences had largely converged with BMD supporters and formed a large body of opinion that is broadly favourable to the idea – if not necessarily the specifics – of both national and theatre ballistic missile defence. This happened largely because with the end of the Cold War, and the rise of rogue states seemingly intent on acquiring WMD, a stronger strategic and technological rationale for ballistic missile defences had emerged.

The evolution of the ballistic missile defence debate after the Cold War has nevertheless been complex, complicated and punctuated. As this thesis shows, the debate and subsequent policy choices would often appear to reflect neither the particular requirements of the international system for US security at any given time, nor indeed the current capabilities of BMD technology. In the words of former Washington Post correspondent Bradley Graham:

> The story of how missile defense re-emerged is complex and contentious. It is a tale of disputed intelligence assessments and reactive political decisions, of hurried technical development and embarrassing misfires, of dated old world treaties and ill defined new world orders.[8]

This thesis seeks to place these debates surrounding ballistic missile defence, and their evolution, within historical context. In doing so, it seeks to demonstrate the centrality of domestic political actors and dynamics in this evolution, in order to unearth how and why the debate shifted during this period.

[8] Graham (2003) xxiv

This thesis is driven primarily by a desire to understand how and why policy has evolved in the manner that it did. In offering an analysis that highlights the crucial role of domestic political dynamics in the missile defence story, the thesis seeks to explain why policy so often appeared out of sync with developments in the international system, and likewise did not mirror the prevailing state of scientific opinion regarding technology. In other words, why renewed emphasis on BMD often came at times when the international environment appeared relatively benign, or when scientists and engineers questioned the technological feasibility of such a strategy. In doing so, the thesis develops an explanatory framework allowing for systematic analysis of the impact of different dynamics on different levels of analysis on policy over time, and to examine why the debate changed.

The thesis makes two important contributions to our understanding of the evolution of US BMD policy after the Cold War. First, it is argued that the particular balance between domestic political institutions and party political pressures have been far more important in shaping BMD policy during each presidential administration since the end of the Cold War than has previously been acknowledged. Specifically, the work highlights the central importance of the balance between president and Congress, and shows how particular presidents were enabled or constrained in what they did – relative to what they wanted to do – by a sometimes compliant and at other times hostile Congress. By doing this, the thesis demonstrates that in general, Democrats tended to favour restraint, while Republicans favoured pushing ahead with missile defence development and deployment. Second, it argues that developments in the international system and advances in technology gradually altered the context within which this domestic political debate occurred. The thesis shows how a convergence of advancing technological capability and the changing requirements of US security in light of changes in the international system made BMD progressively less contentious and divisive during this period. The debate evolved from a position where, in 1989, the technology did not exist to counteract the large missile threat from the Soviet

Union, to a position in 2010 where the technology to provide a credible defence against Iran, North Korea and other more limited missile threats did appear to exist.

By doing this, the thesis argues that *domestic political actors*, often – but not always – acting for *domestic political reasons*, and the interaction of domestic political variables with gradual changes in the international system and developments in technology, are the key reasons why the US BMD debate went from being fundamentally zero-sum and divisive in 1989, to something that had largely become normalised, with debates really only being conducted at the margins, in 2010. In this sense, the thesis explains the rhythms of day-to-day policy in particular context, explains the medium term shifts in the domestic political space within which day-to-day policy debate occurred, and explains the long-term move towards a greater role and the gradual normalisation of BMD in American security policy.

This thesis begins in Chapter 1 with a description of the conceptual framework, methods and methodology employed in this study. To this end, the chapter fully explains the rationale for the project and the limitations of both professional and academic literatures in trying to explain the evolution of the BMD debate between 1989 and 2010, before outlining the central questions that this thesis seeks to address. It then goes on to introduce and explain the conceptual framework developed and used in this study, before finally reflecting on the central contributions of the thesis, and its positioning alongside other works that emphasise the importance of domestic dynamics to national security policy.

The thesis' historical account begins in Chapter 2 with the presidency of George H. W. Bush, a period which saw the demise of the Soviet Union and with it Ronald Reagan's Strategic Defense Initiative. The chapter explains how Bush sought to adapt missile defence to rapidly fluctuating pressures from the international system, while at the same time seeking to balance this

policy with perceived domestic political requirements. In terms of policy, this period saw the Phase I Strategic Defense System outlined by the Reagan administration in 1987 transform into the Global Protection Against Limited Strikes (GPALS) system in early 1991. Bush's presidency would also include the signing of the 1991 Missile Defense Act in the wake of the perceived success of the Patriot missile defence system during the Persian Gulf War, and why this represented a political compromise that never looked likely to hold. Finally, the chapter explains the importance of the different conceptions of BMD held by Bush and Congress and how this led to a gradual rationalisation of the Strategic Defense Initiative between 1989 and 1993.

The next chapter, Chapter 3, focuses on Bill Clinton's first administration between 1993 and 1997. This period began with the new president's determination to "end the star wars era" and to fundamentally restructure and downsize the US BMD effort. To an extent, during the first two years Clinton managed this, and successfully placed the ABM Treaty back at the heart of US national security policy and the relationship with Russia. The chapter also highlights the importance of the "Republican Revolution" in late 1994, and how the political pressure generated after this event led Clinton to outline a national missile defence deployment programme in early 1996 that had little basis in technology or current levels of threat. Essentially, this chapter explains how the missile defence programme was resurrected after its apparent death with the end of the Cold War, and why Clinton had decided to alter his administration's initial plans by the time he sought re-election in 1996.

Chapter 4 addresses Clinton's second term, and charts the fierce political battles between president and Congress that would gradually see the NMD programme move towards the verge of enactment by 2000. This chapter also shows how consistent Republican political pressure, coupled with developments such as the "Rumsfeld Report" and North Korean missile launches of 1998, would see Clinton sign the 1999 Missile Defense Act and reluctantly move gradually closer to ordering deployment. This period is equally interesting because of the apparent lack of

synchronicity between politics and technology. In particular, although the debate had swung in favour of NMD deployment by 1999, many independent scientists, Democratic lawmakers, and members of the Clinton Administration, continued to believe that the technology to achieve such a feat remained many years away. Despite this fact, it would be during Clinton's second term that the political debate would move away from zero-sum disputes over deployment towards a loose agreement over the need for a national missile defence system.

Chapter 5 covers the first four years of the presidency of George W Bush, arguably the most important transitional period looked at in this thesis. Under Bush's stewardship, the US missile defence programme went from rhetoric to reality, as Bush abrogated the Anti-Ballistic Missile Treaty in 2002 and by 2004 began deploying long-range interceptor missiles in Alaska and California. The chapter seeks to address the questions of why Bush was able to push ahead with the programme despite entering office faced with a determined Democratically controlled Congress, and why the subsequent rush for deployment appeared to have only a limited technological or systemic rationale. The chapter also addresses the political and strategic importance of the 9-11 terrorist attacks, and how this event bolstered the drive towards deployment by nullifying both international and Congressional opposition, which in turn fundamentally shifted the BMD debate.

The examination of BMD under Bush continues in Chapter 6, where attention is paid to the alacrity with which Bush set about entrenching BMD as a key component of US security, and in particular to the decision to expand the BMD system to Europe. This chapter looks at why Bush was able to push ahead with a variety of different missile defence systems, retain high levels of funding and continue deploying assets, despite continuing problems with technology; more optimistic intelligence estimates of the Iranian and North Korean WMD programmes; mounting concerns about US BMD plans in Russia, and at the same time as fighting wars in Afghanistan and Iraq. In addition to this, the chapter explains why Democratic control of Congress during 2007 and 2008 was a major reason why Bush was unable to fully realise his expansive missile defence

agenda, as lawmakers strove to enforce greater oversight and scrutiny of the programme during Bush's last two years in office.

Chapter 8 looks at the first two years of Barack Obama's presidency, a period which saw considerable continuity in policy, despite the president's pre-election pledges to scale the programme back and rebalance US national security and non-proliferation strategies. The chapter explains why Obama decided not to cancel missile defence in Europe, why US BMD plans were not used as a bargaining chip in negotiations with Russia over the New START Treaty, and why the Phased Adaptive Approach to Europe and the Ballistic Missile Defence Review appeared to represent a significant commitment to BMD from a president apparently determined not to let the programme get in the way of his wider policy agenda. The chapter also explains how – despite being in the minority in Congress – Republican lawmakers were able to exert considerable pressure on Obama's BMD thinking, but also how Obama was able to neuter this pressure by combining missile defence deployments in Europe with nuclear reductions with Russia.

The final chapter draws the overarching argument of the thesis to a conclusion, highlighting the fundamental role of domestic political influences in understanding the evolution of US missile defence policy. As well as demonstrating the centrality of the domestic political debate to policy, and explaining how and why the confines of this debate gradually shifted over time, this chapter also reflects more broadly on some of the key themes and arguments developed in the thesis. Consequently, it shows how and why the US ballistic missile defence debate evolved from the zero-sum disputes that characterised the end of the Cold War, into an issue which had essentially become a normalised component of US national security thinking and policy by the midway point of Barack Obama's first term in office.

Conceptual Framework

The central aim of this thesis is to understand the complex and often messy evolution of US ballistic missile defence policy between 1989 and 2010, in order to analyse the core driving factors that have shaped the policy following the end of the Cold War. The main objective of the thesis is therefore to systematically uncover key causal factors in order to provide a deeper and more holistic analysis of a phenomenon that has escaped parsimonious explanation. To do this an explanatory framework was developed that allowed for the rigorous investigation of various factors at different levels of analysis in order to identify the dynamics driving and shaping policy. This framework was then applied in turn to each of the six terms in office of the four presidents since the end of the Cold War.

By undertaking this task, the thesis adds value to the current literature by demonstrating that the "day-to-day" dynamics and intrigues of domestic politics have been far more important in the conduct of BMD policy than has currently been acknowledged. Moreover, the thesis shows how the degree of latitude for presidential independence in decision-making on BMD has varied, and has been shaped by the actions of a sometimes compliant, but at other times hostile, Congress. In addition to this, the thesis provides an explanation of how developments in the international system and technology have gradually altered the context within which the domestic political debate has occurred over the last two decades, but have not themselves necessarily driven the policy debate. This redresses a gap in the current BMD literature, which has neglected the role of domestic political influences, or simply paid lip service to it without developing a systematic explanation of its impact on policy. It also explains the transformation in the US missile defence debate during this period.

This chapter proceeds in three sections; (1) the first explains the rationale of the thesis by highlighting the problematic and complex nature of US ballistic missile defence policy between 1989 and 2010, as well as the limited explanatory power of the literature that has attempted to understand this; (2) the second section introduces the framework of analysis that has been developed and utilised in this thesis, and explains how it has been applied to the evolution of the US missile defence debate; (3) lastly, the third section reflects on some of the key findings of the thesis, its central contributions, and consequently where it fits within the broader literature on the domestic sources of national security policy.

Rationale

Although the current literature on BMD policy is vast, it largely fails to explain the transition in the debate surrounding US BMD policy between 1989 and 2010. The authorship of the literature is currently bifurcated; some is written by security policy professionals, and some by academics, but taken as a whole, neither group has been able to adequately explain the fact that policy has often seemed out of sync with developments in the international system, whereby renewed presidential emphasis on BMD has often come at times when the international environment appeared relatively benign from the US perspective, and at times appeared to go against a particular administration's own stated plans. Examples of this include; George H. W. Bush's decision to push ahead with his comprehensive GPALS BMD plan despite the collapse of the Soviet Union in 1991; Bill Clinton's decision to unveil a BMD deployment plan in early 1996 and move gradually towards a deployment decision in 2000, even though he wanted to reverse large parts of the programme that he had inherited upon entering office in 1993, and despite the fact that he viewed the ABM Treaty as the cornerstone of international stability. Further examples are George W. Bush's haste to push ahead with BMD upon entering office in 2001, and then abrogate the ABM Treaty following the attacks of 11th September 2001, despite those attacks seeming to point to terrorism not ballistic missiles as

being the main threat; and Barack Obama's decision to continue, and in some respects expand the BMD system inherited from his predecessor, despite a pre-election pledge to rebalance US foreign and security policy and focus more time on other issues.

Neither has the literature adequately explained why policy has not necessarily mirrored the prevailing state of scientific opinion regarding technology, with renewed presidential emphasis on BMD often coming at times when scientific reports have questioned the feasibility of the strategy. George H. W. Bush's prioritisation of Brilliant Pebbles technology during the early 1990s;[1] Bill Clinton's decision to begin a deployment plan in 1996 and to sign the 1999 Missile Defense Act without having any credible technology anywhere near ready to be deployed,[2] are examples of this, as was George W. Bush's decision to begin deploying ground-based interceptor missiles in Alaska and California in 2004, and begin negotiations about deploying more interceptors in Europe in 2006 despite the fact that neither system had undergone full testing.[3] Barack Obama's decision in 2009 to reorient US BMD plans in Europe around some technologies that were yet to be designed, let alone tested, is a further example of this disjuncture.[4]

What this suggests is that there is much more to BMD than simply recording whether presidents have been personally convinced by the wisdom of the policy; whether the technology to pursue such systems has existed; or the perceived requirements for US security of the particular context of the international environment within which each president was acting. It also implies that there are important questions that need to be asked about the domestic political conditions within which each president since Ronald Reagan has been formulating and executing policy. These dynamics would appear to present five main questions, which the existing literature has been notably silent about:

[1] See,"Strategic Defense Initiative: estimates of Brilliant Pebbles effectiveness are based on many unproven assumptions", *US General Accounting Office,* (March 1992)
[2] See, "Director of operational test and evaluation report in support of national missile defense deployment readiness review", (10th August 2000)
[3] See Lisbeth Gronlund, David Wright, George Lewis & Phillip Coyle, "Technical realities: an analysis of the 2004 deployment of a national missile defense system", *The Union of Concerned Scientists,* (May 2004)
[4] "Fact Sheet on US Missile Defense Policy: A Phased Adaptive Approach for Missile Defense in Europe", (17th September 2009)

1) Why has the BMD debate so often failed to fully represent external or systemic developments?
2) Why has the BMD debate so often failed to fully represent independent scientific opinion on missile defence technology?
3) What factors have caused particular presidents to pursue BMD policies that appear contradictory to stated policy?
4) Why did the domestic BMD debate shift from zero-sum disagreement to general acceptance between 1989 and 2010?
5) Can the evolution of policy within the six presidential administrations examined during this period (from George H. W. Bush to Barack Obama) be systematically explained?

Although the quantity of the professional and policy-orientated literature on the subject is considerable, its explanatory power is limited by the tendency to be overly context specific and/ or based purely on a single level of analysis. Consequently, the literature often appears to bypass the larger issue of attempting to understand policy more broadly and in historical context. In this mode, James Lindsay & Michael O'Hanlon's *"Defending America"*[5] and Craig Eisendrath, Melvin Goodman & Gerald Marsh's *"The Phantom Defense"*[6] both discuss the prudence of the Bush administration's plan to push ahead with BMD deployment in early 2001, but offer little to situate this in the broader evolution of policy; Joseph Cirincione's *"Why the Right Lost the Missile Defence Debate"*[7], and *"Assessing the Assessment"*[8], both analyse a single static case; as does Dennis Gormley's *"Enriching Expectations"*[9] and Dean Wilkening's *"Amending the ABM Treaty"*.[10]

[5] James Lindsay & Michael O'Hanlon, *"Defending America: the case for limited national missile defence",* (Washington DC, Brookings Institution Press: 2001)
[6] Craig Eisendrath, Melvin Goodman & Gerald Marsh, *"The phantom defense: America's Pursuit of the Star Wars illusion"*, (Connecticut, Praeger Publishers: 2001)
[7] Joseph Cirincione, "Why the right lost the missile defense debate", *Foreign Policy,* 106 (1997) pp38-70
[8] Joseph Cirincione, "Assessing the assessment: the 1999 National Intelligence Estimate of the ballistic missile threat", *The Non-proliferation Review,* (Spring 2000) pp125-136
[9] Dennis Gormley, "Enriching expectations: 11th September lessons for missile defence", *Survival,* 45:4 (2002) pp61-86
[10] Dean Wilkening, "Amending the ABM Treaty", *Survival,* 42:1 (2000) pp29-45

Examples of BMD literature being mono-causal include Major Garret's *"The Enduring Revolution"*[11], which points to the centrality of Republican Party politics in the resurrection of BMD during the 1990s, but fails to connect this with broader strategic and technological dynamics; Wyn Bowen's *"Missile Defence and the Transatlantic Security Relationship",*[12] which looks at the diplomatic aspects of BMD at a specific time; or Richard Garwin's *"A Defense That Will Not Defend"*[13], which looks primarily at the inadequacies of BMD technology during 2000.

The explanatory power of the more theoretically orientated academic literature – which is far more limited in quantity – is restricted by a tendency towards mono-causality and explanations based on a single-level of analysis. Natalie Bormann's poststructuralist critique of US BMD policy in *Missile Defence and the Politics of US Identity*[14] ignores a wide range of important causal factors in order to show how the constitutive power of discourse and the construction of threat through US identity have driven BMD policy. While Bormann may be right to suggest that such factors are important, by treating the state as a unitary actor – and largely ignoring the importance of the international system – her work fails to look at the myriad influences both above and below state level, or to account for fluctuations in BMD policy over time. In a similar vein, Columba Peoples' work focuses almost exclusively on technology as the key driver of BMD policy in *Justifying Ballistic Missile Defence.*[15] Peoples is right to point to the importance of technology, but by ignoring other political and strategic factors neglects the wider picture, and thus can explain only part of the whole story about developments in and drivers of BMD policy.

Lastly, and while no official history of US ballistic missile defence has yet been written, the historical analyses that have been written on the subject tend to prioritise factual narrative rather than explanatory analysis. As a result, work such as *The Quest for Ballistic Missile Defenses 1944-*

[11] Major Garret, *"The enduring revolution: how the contract with America continues to shape the nation",* (New York, Random House: 2005)
[12] Wyn Bowen, "National missile defence and the transatlantic security relationship", *International Affairs,* 77:3 (2001) pp485-507
[13] Richard Garwin, "A defense that will not defend", *The Washington Quarterly,* 23:3 (2001) pp109-123
[14] Natalie Bormann, *"National missile defence and the politics of US identity",* (Manchester, Manchester University Press: 2008)
[15] Columba Peoples, *"Justifying ballistic missile defence",* (Cambridge, Cambridge University Press: 2010)

2003 by Lester Brune and Richard Burns[16] and *Hit to Kill* by Bradley Graham[17], essentially fail to provide deep and systematic analysis of the dynamics driving policy, and of how these factors interact. Although these works are very useful as a basis from which to build a deeper and more explanatory analysis that can add value to and go beyond the current literature, they do not specifically address the question of what has been shaping policy since the end of the Cold War, how and why.

Framework for analysis

In order to move beyond existing accounts, and to address the research questions highlighted above, it is necessary to adopt an explanatory structure that sets the question of the politics of BMD within a potentially interdisciplinary framework. To do this, the thesis turns to the field of Foreign Policy Analysis (FPA). The core refrain of FPA is to seek to understand foreign policy by focusing on the process of how such decisions come about, and by drawing upon a range of causal factors situated at different levels of analysis. At the heart of this approach is an acceptance that parsimony should be eschewed in favour of "detail, richness, nuance and agency" and general explanatory power.[18] As a result, Foreign Policy Analysis appeared to offer the perfect basis from which to construct a specific analytical framework and methodology with which to systematically analyse the complex nature of BMD. Adopting this approach would allow for the development of a framework capable of capturing the interaction between domestic, technological and international influences over the sustained period covered by this thesis.

Foreign Policy Analysis is a broad approach with a rich and diverse history that incorporates many different types of methodological approaches. Yet what unites FPA as a discipline is that for the most part, the plethora of methodologies focuses on the motives and sources of state behaviour,

[16] Burns & Brune (2003)
[17] Graham (2003)
[18] Valerie Hudson, *"Foreign policy analysis: classical and contemporary theory",* (Plymouth, Rowman & Littlefield Publishers Inc: 2007) 188

and seeks to understand this behaviour by focusing on decision-makers and the processes by which state policy is created and shaped. As a result, it consists of middle-range theories, which ultimately seek to examine, systematically analyse and better understand the messy nature of reality rather than attempt to provide a single theory of foreign policy behaviour.[19] Laura Neack sums this up well:

> Foreign policy is neither fish nor fowl in the study of politics, but an empirical subject matter straddling the boundary between the internal and the external spheres of a state. Such policy is conducted in complex internal and international environments; it results from coalitions of active actors and groups situated both inside and outside state boundaries; its substance emanates from issues of both domestic and international politics; and it involves the process of bargaining and compromise affecting the interests of both domestic and international groupings.[20]

In this regard, as Christopher Hill points out, "Foreign Policy Analysis can and should be open, comparative, conceptual, interdisciplinary and range across the domestic-foreign frontier."[21]

The subfield of FPA has its origins in three seminal works; (1) James Rosenau's *Pre-theories and Theories of Foreign Policy*[22]; (2) Richard Snyder, Richard Bruck and Burton Sapin's *Decision Making as an Approach to the Study of International Politics*[23]; and (3) Harold and Margaret Sprout's *Man-milieu Relationship Hypothesis in the Context of International Politics"*.[24] According to Valarie Hudson and Christopher Vore, each of these works played a major role in launching a different aspect of Foreign Policy Analysis. Rosenau's work sought to encourage "cross-nationally applicable generalizations about the foreign policy behaviour of states in a systematic and scientific fashion"; Synder's to "look at the nation state level of analysis and to emphasise the players involved in foreign policy"; and Harold and Margaret Sprout's to

[19] Christopher Hill, *"The changing politics of foreign policy"*, (Basingstoke, Palgrave Macmillan: 2003) 10
[20] Walter Carlsnaes, *"Actors, structures, and foreign policy analysis"*, chapter in Steve Smith, Amelia Hadfield & Tim Dunne, *"Foreign policy: theories, actors, cases",* (Oxford, Oxford University Press: 2010) 86
[21] Hill (2003) 10
[22] James Rosenau, *"Pre-theories and theories of foreign policy"*, R. Barry Farrell, *"Approaches in comparative and international politics"*, (Evanston: Northwestern University Press: 1966)
[23] Richard Snyder, Richard Bruck, and Burton Sapin, "*Decision-making as an approach to the study of international politics",* Foreign Policy Analysis Project Series No. 3, (Princeton: Princeton University Press: 1954)
[24] Harold Sprout & Margaret Sprout, "*Man-milieu relationship hypotheses in the context of international politics",* (Princeton: Princeton University Press: 1956)

contextualise the analysis of foreign policy by pointing to the importance of multi-causal explanations drawn from a variety of fields.[25]

From this initial basis, a set of propositions have been developed to which most Foreign Policy Analysis approaches adhere:

(1) That the concept of national interest is perhaps more productively viewed as the interests of various players, or entities, which may not coincide, and which many not relate to anything resembling an objective national interest. Consequently, that the source of much of "states" behaviour is the result primarily of human beings not states.

(2) A desire to open up the "black box" of foreign policy in order to seek explanations of state behaviour through the people and units that comprise or influence the state, thus taking into account multiple levels of analysis, ranging from the micro to the macro, as well as a commitment to pursue multi-causal explanations spanning multiple levels of analysis.[26]

(3) A belief that foreign policy *inputs* are as, if not more important than foreign policy *outputs* – and a need to focus on the *process* through which policy is formed.

As this list of propositions makes clear, the aim of any Foreign Policy Analysis study is to integrate and assess the interrelationship among factors that influence foreign policy decision-making and decision-makers at different levels of analysis.[27] Studies in Foreign Policy Analysis "draw on multiple theories, employ a range of methodologies; focus on the complex interactions between foreign policy factors, and link scholarly research to practical policy concerns."[28]

However, while this allows the scholar great freedom to design their particular project around the specifics of the subject and questions that they are seeking to answer, it also means that a

[25] Valerie Hudson & Christopher Vore, "Foreign policy analysis: yesterday, today, tomorrow", *Mershon International Studies Review,* 39:2 (1995) pp209-238: 212-214
[26] This list draws on Hudson & Vore (1995) 210-22
[27] Hudson (2007) 5 & 165
[28] Jean Garrison, "Foreign policy analysis in 20/20: a symposium – Introduction", *International Studies Review,* 5 (2003), pp155-202: 155

analytical and conceptual framework must be designed in order that the information collected can be systematically analysed. As Walter Carlsnaes points out:

> … Given the existence of a number of national and international *actors* involved in the pursuit of any given state's foreign policies, as well as the vital role which a multitude of *structural* factors play in such processes, it is essential for the scholar to have some form of analytical framework or approach as a starting point.[29]

Therefore, the actual framework adopted in this thesis needed to be driven by the types of question it sought to address, and by a particular mixture of the tools available within Foreign Policy Analysis. Therefore, the logical starting point was to look at which factors were important in the conduct of BMD policy, as well as how the change in relative importance of these factors could be analysed over time.

Considering the problems highlighted earlier in this chapter, the most relevant parts of FPA for the investigation of US BMD policy appeared to be the "foreign policy decision making" developed by Richard Synder et al and the "foreign policy context" developed by Harold and Margaret Sprout. However, these two works have formed the basis of a wide and diverse body of literature, and it was therefore important to look deeper into how other authors have configured their studies. In this regard, one of the key influences for this work is the conceptual model first outlined by Graham Allison in *"Essence of Decision"*[30]. In this seminal work, Allison outlines an approach to the study of the Cuban missile crisis whereby events are analysed through three separate conceptual lenses: rational actor, organisational process and bureaucratic politics models. In the words of Allison, "By comparing and contrasting the three frameworks, we see what magnifies, highlights, and reveals as well as what each blurs or neglects".[31] By doing this, Allison was able to show how different perspectives on an event naturally provide different answers and explanations of its cause.

[29] Ibid 87
[30] Graham Allison, *"Essence of decision: explaining the Cuban missile crisis",* (London, Scott, Foresman and Company: 1971)
[31] Allison (1971) v

However, and while Allison's original ideas are key to the conceptual framework applied in this thesis – specifically the desire to look inside the black box of the state, and show that different interpretations can be placed upon events if looked at from different angles – the particular approach developed here seeks to move beyond some of the limitations inherent in his original framework. First, whereas Allison's approach sought to separate factors – and essentially tell the same story three times – the conceptual framework developed in this thesis has been designed in order to compare, contrast and integrate the impact of these key factors on policy. Second, while Allison's account is a detailed study of a single crisis event over a very short contained period, the approach taken here seeks to survey a period that is sprawling by comparison, and attempts to weave different strands of causation together into one narrative rather than offering several different ones in parallel. Consequently, the aim is not so much to view BMD through different conceptual lenses, but instead to construct a conceptual framework able to analyse how these factors have interacted, and how important they have/ haven't been at specific times.

The result is an explanatory framework designed to engage three distinct types of causal variable:

(i) Strategic/ systemic factors (primarily the pressures on presidential policy arising from developments in the ballistic missile threat, the views of allies, and the international legal context).

(ii) Technological factors (notably the evolution of capabilities to build a functioning BMD system and independent scientific opinion about the feasibility of any proposed system).

(iii) Party political factors (in particular the impact of institutional rivalry and partisanship on Congressional support as a facilitator of or constraint on presidential preferences regarding BMD).

This framework is then used to analyse each successive presidential administration in turn, where each administration forms the basis of a chapter. Each chapter is then split into three sections. The first section providing an overview of developments in each of the three main factors (with party political factors split between "presidential policy agenda" and "Congressional pressure on policy"), the second outlining the major policy developments during the period, while the third seeks to compare the various pressures on policymaking with policy outcomes in order to demonstrate the relative importance of domestic political factors, and also how the dynamics interacted. By doing this, the thesis is able to look at and analyse the importance of a set range of factors within each administration, and thus to draw wider conclusions by tracing the evolution of these factors over the period under study. It was therefore logical for the thesis to be written predominantly in chronological order, both to allow the clear tracing of change over time and, importantly, to allow for the development of comparative analysis.

In order to fully utilise this explanatory framework, and move beyond the limitations of much of the literature, it was essential that this investigation be based on primary materials and evidence. 23 semi-structured interviews were carried out with a variety of policy-makers, commentators and government officials from both sides of the political divide in Washington DC during summer 2010.[32] A wide range of secondary and archival documents, including presidential speeches, government policy documents, Congressional hearings and newspaper articles, were also consulted, in addition to the vast available tertiary BMD literature. As a result, the research was able to look much deeper into the BMD phenomenon and use this primary information both directly in terms of quotes and factual detail, and indirectly by using the views expressed by interviewees or in primary documents as indicative of wider ideological/ political thinking on BMD during this period.

Finally, it is important to be clear what this thesis does not intend to do or to argue. Perhaps most significantly this work does not intend to make a strategic assessment on the relative merits of

[32] For a full list of these interviews, see Bibliography

deciding to pursue missile defences. In this sense, it does not seek to directly address the debate over whether deployment is a good or bad idea, or about what type of system should be deployed. Equally, this thesis does not seek to offer a scientific critique of missile defence technologies; this task is left to the many physicists and engineers currently working on the issue. As such, this research remains firmly within the realm of political science and contemporary history.

Contributions and positioning

This thesis fits within the broader landscape of thinking about the affects of domestic dynamics and the domestic political process on shaping national security policy. This type of research spreads the breadth of the social sciences and has a particularly long and established tradition of use in analysing US national security thinking[33], US nuclear weapons policy[34], and to a lesser extent US missile defence policy[35]. However, by developing a systematic analysis of domestic political influences, and how they have interacted with other factors to shape BMD policy over time, this thesis moves beyond the relatively simplistic understandings of "domestic politics" in much of this literature, and applies this framework to an issue that hitherto has not been fully analysed.

While the literature on the domestic determinants of security policy is rich and varied, this thesis is able to move beyond and add to it in two main ways. First it extends this analysis to the contemporary US ballistic missile defence debate, bringing the story up to 2010 – the point

[33] General works looking at the role of domestic political influences in US foreign policy include, James McCormick and Eugene Wittkopf, *"The domestic sources of US foreign policy",* (New York, Rowman & Littlefield Publishers Inc: 2007) and Julian Zelizer, *"Arsenal of democracy: the politics of national security – from World War II to the War on Terrorism",* (New York, Basic Books: 2010)

[34] Works looking at the domestic determinants of US nuclear strategy include, Janne Nolan, *"Guardians of the arsenal: the politics of nuclear strategy",* (New York, Basic Books: 1989), David Dunn, *"The politics of threat: Minuteman vulnerability in American national security policy",* (Basingstoke, Palgrave MacMillan: 1997), William Baugh, *"The politics of nuclear balance: ambiguity and continuity in strategic policies",* (London, Longman: 1984), Nick Ritchie, *"US nuclear weapons policy after the Cold War",* (London, Routledge: 2009), Wyn Bowen, *"The Politics of Ballistic Missile Nonproliferation",* (Basingstoke, MacMillan Press Ltd: 2001), Barry Blechman, *"The politics of national security: Congress and US defense policy",* (Oxford: Oxford University Press: 1992) and Michael Krepon, *"Strategic stalemate: nuclear weapons & arms control in American politics",* (London, MacMillan Press Ltd: 1984).

[35] Works looking a the domestic politics of US missile defence include, Gerald Steinberg, *"Lost in space: domestic politics of the Strategic Defence Initiative",* (Cambridge, The Free Press: 1988), Gordon Mitchell, *"Strategic deception: rhetoric, science and politics in missile defense advocacy",* (Michigan, Michigan State University Press: 2000),

whereby missile defence had arguably emerged from decades of partisan political disagreement – and become accepted as a central component of US national security thinking. In this sense, it is able to look at why the domestic debate changed and gradually became normalised. Second, it moves beyond the rather vague and catchall tendencies of studies that emphasise domestic political dynamics, whereby the use of the term "domestic politics" refers simply to anything that occurs within the domestic realm, by applying a systematic domestic political analysis to the issue of BMD, but also by being far more precise in what "domestic politics" actually means.

This research therefore both extends the tradition of examining the domestic political determinants of security policy to an important contemporary issue, and at the same time provides a more rigorous assessment of what this actually means. Clearly, both the president and members of Congress are office holders under the US constitution and are located in the United States, so they are therefore by definition *domestic actors.* This is therefore one understanding of the importance of domestic politics – and the one that dominates much of the literature. A second understanding of domestic political influences on policy is when something is done for *domestic political reasons*: (1) when something is not based upon the actors true beliefs but is done because of the need to position oneself with regard to opinion elsewhere in the political system; (2) it is not based on the actor's genuine assessment of the international situation/ threat but upon some other vested political interest. Consequently, while both of these are examples of domestic politics, it is important to distinguish between *domestic political actors* and actions that are taken for *domestic political reasons*. The thesis therefore provides a systematic analysis of domestic political influences on the US ballistic missile defence debate, but also shows how these influences has often been underpinned by primarily *domestic political reasons*.

By applying this framework chronologically to the four presidential administrations since the end of the Cold War, the thesis is able to draw the following conclusions. First, technological capability

has only rarely been an important instigator of BMD policy, with many scholars and commentators continuing to question the viability of the systems being deployed even now.[36] Second, although policy was sometimes broadly correlated with developments in the international system – especially the growing nuclear and missile threat from Iran and North Korea – the particular rhythms of whether to push ahead with ballistic missile defences were significantly conditioned by domestic variables. Third, the institutional balance between president and Congress has been, and will continue to be, fundamental to BMD policy, especially in times of partisan divided government.

As a result, the thesis shows that the day-to-day dynamics and intrigues of US domestic politics have been far more important in the conduct of policy than the literature has thus far acknowledged. External influences related to the ability of the US to sustain its place in international affairs, and the ability of modern technology to sustain an operative BMD system, have certainly shaped the way in which policy was debated and fought over within the domestic realm at any moment in time. However, the most important factor explaining the historical ebb and flow of presidential policy remained the precise degree of latitude for presidential independence provided by a sometimes compliant but other times hostile Congress.

The thesis shows that domestic party politics and ideological differences between president and Congress – as well as between Democrats and Republicans – ensured that BMD policy only infrequently reflected strategic necessity or independent scientific reports regarding the operational feasibility of proposed systems. At a deeper level, the thesis shows that for a mixture of ideological and party political reasons, Republican lawmakers tended to support further BMD spending and development, while Democrats generally favoured restraint (though not necessarily reversal of policy). The work also shows that policy was far more likely to forge ahead under Republican rather than Democratic presidents, and that Democratic Congresses were able to exert less influence on presidential policy than Republican Congresses – primarily because of the changing confines of

[36] See for example Theodore Postol & George Lewis, "The European missile defense folly", *Bulletin of the Atomic Scientists*", 64:2 (May/ June 2008) pp32-39; Yousaf Butt, "The myth of missile defense as a deterrent", *Bulletin of the Atomic Scientists*, (8th May 2010)

the debate. The result was a policy which fluctuated considerably after it was resurrected by Ronald Reagan in 1983, but one that overall displayed a cumulative logic which appears likely to lead towards an even greater role for BMD in the future. Changes in the international environment in the intervening period are an important reason why this has been so, with changes to the perception of who might threaten the US, and in what way, making it progressively more straightforward for Republican presidents in particular to present BMD as a common sense choice.

In doing this, the thesis also provides an explanation of how developments in the international system and technology have gradually altered the context within which the domestic political debate has occurred. Fundamentally, the thesis shows how the convergence caused by the meeting of technological capability and the changing requirements of US security within the international system made BMD less contentious and divisive during this period. For example in 1989 the technology did not exist to counteract the large missile threat from the Soviet Union, but in 2010 the technology did exist to offer a credible defence against Iran, North Korea and other limited missile threats. The result was a gradual move towards political acceptance during this period. As such, the thesis shows how and why BMD went from being one of the most zero-sum divisive political issues in American national security thinking, to something that had largely become normalised, with debates really only being conducted at the margins during this period. This was why in 2010 a Democratic president was spending $10b per year on an advanced integrated missile defence system, after Democratic lawmakers had tried to eliminate funding for the Strategic Defense Initiative in 1989. In summary, the thesis engages with short-term day-to-day political debates, medium term shifts in context, and the longer term moves towards political acceptance and the strategic normalisation of BMD.

Summary

The approach employed in this thesis is driven by a desire to understand why the US ballistic missile defence debate – which in 1989 had fundamentally split political opinion – evolved towards a position by 2010 where it appeared to be politically normalised, and by the apparent inability of the BMD literature to adequately explain this transition. In seeking to answer this question fully, it seemed necessary to adopt an approach that would allow the investigation to look at a wide range of causal factors on different levels of analysis over a sustained period. It was therefore natural to turn to the field of Foreign Policy Analysis to provide a conceptual basis for a framework able to tackle an issue that appeared to be influenced by different factors on multiple levels of analysis. Once armed with this framework, the investigation was then able to critically analyse how and why policy developed during the six administrations covered by this study. By doing this, the thesis demonstrates the centrality of domestic actors and dynamics to understanding US ballistic missile defence policy; how a mixture of ideology and party politics was integral in shaping presidential BMD strategies, and explains the consequent evolution of the US BMD debate during this period. As a result, the thesis makes a worthwhile and original addition to the growing body of literature on the importance of domestic politics in shaping national security policy, while situating these pressures within a wider political context shaped by changes in technological capabilities and developments in international system.

The Missile Defence Pragmatist – George H. W. Bush, (1989-1993)

As Ronald Reagan left office in January 1989, the future of the Strategic Defence Initiative looked uncertain. Many of the futuristic technologies that the SDI had advanced were considered technologically unworkable, while Democrats in Congress – who had never been much enamoured of President Reagan's plans – were keen to limit a programme that they thought made little strategic, diplomatic or technological sense. On top of this, it was not clear what Reagan's successor; his former Vice President George H. W. Bush had planned for programme. Bush was known to have been far less supportive of SDI than the president during his time in the Reagan administration, and was also considered something of a political pragmatist, keen to conduct policy on a day-to-day basis depending on the particular context at that time. Although it was assumed that Bush would retain the programme, it was far less clear what shape it would take over the four years of his presidency.

In fact, the evolution of US ballistic missile defence policy under George H. W. Bush is perhaps the most complex and complicated of all the presidencies looked at in this thesis. In early 1989 it seemed that BMD was regarded by the president merely as a bargaining chip for negotiations with the Soviet Union, but Bush subsequently became far more supportive after becoming convinced about the prospects of a BMD technology that later proved not to work. Two years into his presidency, Bush signed the National Missile Defense Act of 1991, making it the policy of the United States to deploy a ballistic missile defence system at the earliest possible date, even though this really reflected neither Bush's priorities, external pressures, nor current technological capabilities.[1] On top of this is the fact that policy was being formulated against the

[1] See David Smith, "The missile defense act of 1991", *Comparative Strategy,* 12:1 (1993), pp71-73

backdrop of a fundamental change in the international system caused by the collapse of the Soviet Union, and the realisation that the US had emerged as the world's pre-eminent power, with no military peer in sight. It was in this context that US BMD policy went from the grandiose Phase I Strategic Defense System devised by Ronald Reagan to the more limited, but equally exigent Global Protection Against Limited Strikes (GPALS) system, favoured by Bush. Despite this change, by the end of Bush's presidency, little support remained in Congress or amongst the US public for any large scale missile defence plan, and Bush's successor, Bill Clinton, would make it a key priority for his administration to relegate and downgrade the missile defence programme.

This period then raises a number of interesting questions. First, why did Bush continue to favour a large-scale BMD system consisting of hundreds of interceptors and space-based assets, despite the collapse of the Soviet Union, and regardless of the fact that the relevant technological capability to do so did not exist? Second, why did a Democratically controlled Congress unite behind legislation mandating deployment of a national missile defence system in 1991, despite being strongly opposed to such a plan in 1989, 1990 and again in 1992, and regardless of the inherent limitations of technology? Third, why did Bush and Congress have such different and competing notions of what type of BMD programme should be pursued? In order to understand these questions the chapter examines the interplay between international, technological and domestic influences, and at how these combined to produce the complex and sometimes counterintuitive policy outcomes described above.

(1) Competing pressures on BMD policy, 1989-1993

International pressures on policymaking

In 1989 the US remained locked in the Cold War confrontation with the Soviet Union that had lasted for over four decades, and was therefore still subject to the threat of the vast Soviet nuclear ballistic missile arsenal. However, by 1993 the Soviet Union had disappeared, the US stood alone as the world's preeminent power, and the threat to Americans from missile attack – notwithstanding the possibility of an accidental Russian or Chinese launch – was arguably at its lowest since the dawn of the missile age.[2] Three key international dynamics stand out during this period; (1) the end of the Cold War and the collapse of the Soviet Union; (2) the emergence of a new short-range missile threat; (3) the centrality of the Anti-Ballistic Missile (ABM) Treaty and US allies' views of its continued importance.

The first key international pressure on policymaking during this period was the US relationship with the Soviet Union/ Russia. For the first two years of Bush's presidency, US ballistic missile defence policy was inextricably linked with managing the Cold War relationship with the Soviet Union, and was heavily contingent on how US policymakers choose to approach relations with Moscow. Because Russian leaders had never liked SDI, and had continually attempted to link any further strategic arms cuts to limitations in US missile defence plans, Bush's approach to arms control with the Soviet Union would have significant implications for US BMD plans. Although after 1991, as the Soviet Union collapsed, the relationship became less important as Russia came to be seen as less of a threat, the safe transition of the former Soviet Union from Cold War foe to strategic partner, and agreement on further arms reductions, remained linked to limitations in US missile defence plans. Nevertheless, after 1991, the US stood alone as the world's

[2] This was especially the case after George Bush and Russian President Boris Yeltsin signed START II on the 3rd January 1993, reducing both side's strategic warheads to between 3000 and 3500 each. For more on START II see Amy Woolf & Stuart Goldman, "Arms control after START II: next steps on the US-Russia agenda", *Congressional Research Service*, (22nd June 2001)

preeminent power, with no obvious challenger or missile threat in sight; a situation described by one scholar at the time as "the unipolar moment".[3]

The second important international dynamic during this period was growing awareness of the threat from short-range ballistic missiles. Although concerns about a new type of short-range missile threat from smaller rogue states had gained traction during the Iran-Iraq war of the 1980s, the use of Scud missiles by Saddam Hussein during the 1991 Gulf War – in addition to Iraq's possession of WMD's – firmly entrenched this new threat.[4] What is more, despite the fact that the immediate threat from such weapons disappeared with the end of the Gulf War, 1991 marked the beginning of serious US concern about nuclear and missile proliferation to smaller rogue states. Nevertheless, then Director of Central Intelligence Robert Gates suggested that it would be "at least another decade before a genuine missile threat to US security would emerge from other sources".[5]

The final international pressure was the fact that the US remained legally constrained during this period by the Anti Ballistic Missile (ABM) Treaty. Not only did this Treaty preclude deploying nationwide missile defence systems, but it also put limits on what might be tested and developed in terms of non-strategic systems by both the US and Russia. Perhaps even more importantly, the ABM Treaty was internationally regarded as the cornerstone of global stability, particularly by key US allies and Russia, and as the bedrock upon which a secure international order and nuclear reductions could be based following the collapse of the Soviet Union.[6] It was also central to US-Russian relations at a time when the US was concerned to ensure the security of nuclear weapons in post-Soviet states, and to create a positive relationship with Moscow.[7]

Internationally therefore, this period was characterised by the end of the Cold War and the collapse of the Soviet Union, and with it, a significant decline in the missile threat to the United

[3] Charles Krauthammer, "The unipolar moment", *Foreign Affairs*, 70:1 (1990), pp23-33
[4] Graham (2003) 19-20. According to Graham, "The attacks had brought home the deadly reality of missile proliferation". What is more, "Revelations that emerged after the Cold War about Iraq's pursuit of a nuclear program also served to underscore the limitations of international non-proliferation efforts in ensuring US security".
[5] Quoted in David Morrison, "Missile defenses: more debate", *The National Journal*, (8th February 1992)
[6] See Bunn (1990)
[7] James Goldgeier & Michael McFaul, *"Power and purpose: US policy towards Russia after the Cold War",* (Washington DC, Brookings Institution Press: 2003) 9

States. At the same time, the Persian Gulf War – especially the deaths of 28 US service personnel from a Scud missile strike on a US military base near the Saudi city of Dhahran – provided the catalyst for Washington to begin taking the threat from short-range missile attack far more seriously. However, by 1993, the threat of a nuclear ballistic missile attack on the US homeland had declined considerably, and the threat from battlefield missile attack from new smaller adversaries remained negligible, at least in the short term.

Technological pressures on policymaking

In terms of technology there were two significant dynamics shaping policymaking during this period. The first was the impact of a new technology called Brilliant Pebbles on the perceived feasibility of constructing a national missile defence system. The second was the impact of the Patriot battlefield missile defence system during the 1991 Persian Gulf War on both the perceived possibility of constructing battlefield missile defences, and on the perception on BMD more generally. Initially it seemed possible that both technologies might provide a significant boost to the BMD programme, but by the time Bush left office, the missile defence effort being conducted by the Strategic Defense Initiative Organization (SDIO) would be surrounded by controversy.

As Bush entered office, more and more of the technologies that had been examined under the Strategic Defense Initiative were proving to be unworkable, costly, and futuristic. As a result, despite inheriting the Reagan administration's Phase I Strategic Defense System (SDS)[8], none of the components needed for this architecture had been proven or were ready to be deployed in 1989.[9] It was in this context that the possibilities of a technology called Brilliant Pebbles[10] (combined with

[8] This system, unveiled in 1987 was the first national missile defence system developed by the SDIO, and consisted of both ground and space based sensors and weapons, as well as a central battle management system. For more on this see Ronald Powaski, *"Return to Armageddon: the United States and the nuclear arms race,* 1981-1999", (New York: Oxford University Press: 2003) 61-3

[9] See Powaski (2003) 61-3

[10] A more detailed description of Brilliant Pebbles follows later in the chapter.

the Exoatmospheric Re-entry Interceptor System (ERIS), which the Pentagon believed could be deployed by 1996) would have a considerable impact on policymaking during 1989 and 1990.[11] The Pebbles appeared to be a cost-effective and workable way to deploy a nationwide missile defence without having to rely on many of the questionable systems being developed under the Phase I SDS system. However, just as the promise of these technologies would have a positive impact BMD thinking during 1989 and 1990, their failure to materialise, along with problems in many other SDI technologies during 1991, and particularly 1992, would have an equally strong impact on the debate during the second half of this period. As such, by 1993 the US remained many years away from being able to construct even a rudimentary national missile defence system. In fact, in 1992, Pentagon analyst Dr Daniel Chu would suggest that even a 2002 deployment date remained optimistic.[12]

The second key technological dynamic during this period was the perceived successes of the Patriot theatre missile defence system during the Persian Gulf War. The initial reports that Patriot had successfully intercepted Iraqi scud missiles in early 1991 provided a huge boost in Washington for tactical missile defences. It also, erroneously provided impetus for the concept of missile defence more generally. SDIO Director Henry Cooper went as far as to say that it was "hard to think of a better validation" of the Bush administration's missile defence plans than the Patriot's performance during the Gulf War.[13] However, just as this apparent success had been influential during early 1991, the numerous reports questioning the performance of Patriot that emerged over the next 18 months had an equally extensive impact on BMD thinking.[14]

Although Brilliant Pebbles and Patriot provided a temporary fillip in the general perception of the technological efficacy of BMD, the overall trend during this period was towards a growing acceptance that the US remained a long way from being able to deploy even the simplest of

[11] See Donald Baucom, "The rise and fall of Brilliant Pebbles", *The Journal of Social, Political and Economic Studies,* 29:2 (2004) pp143-189
[12] Burns & Brune (2003) 143
[13] Quoted in Mitchell (2000) 127
[14] See Theodore Postol, "Lessons of the Gulf War experience with Patriot", *International Security,* 16:3 pp119-171

effective missile defences. As a result, as Bush left office in 1993, the US appeared many years away from having even a rudimentary missile defence capability that could be deployed.

Presidential policy agenda

As he took office, it was unclear what the election of George H. W. Bush would mean for the future of the US missile defence programme. Bush was vague about the Strategic Defense Initiative during the election; was known to be far less ideologically disposed towards SDI than Ronald Reagan, and was thought to be more pragmatic when it came to conducting international relations. As a result, three dynamics in particular would shape the way that Bush approached ballistic missile defence during this period: his pragmatic leadership style, the perceived requirements of the domestic context within which he was acting, and his approach to Russia and Russian President Mikhail Gorbachev in particular.

The first dynamic that would shape Bush's approach to missile defence was his style of leadership. Bush was known to be something of a pragmatist when it came to policy – preferring to be reactive rather than proactive – and favouring a "realist" approach to international affairs. Unlike his predecessor, Bush surrounded himself with a national security team with mixed views of ballistic missile defence: National Security Adviser Brent Scowcroft and Secretary of State James Baker were sceptical, while Secretary of Defense Dick Cheney, Vice President Dan Quayle[15] and particularly SDIO Director Henry Cooper, were very much in favour. This diversity on the principle of BMD suggested that policy decisions would be swayed less by predetermined thinking,

[15] In fact, Quayle had been a key driver of the need for battlefield missile defence systems, and had begun thinking about this problem in relation to Israel during the 1980s when he was a member of the Senate Armed Services Committee. Confidential interview (E).

and more by the political and strategic requirements at any given time.[16] Baker Spring would later describe this approach as "inbox diplomacy".[17]

The second factor underpinning Bush's thinking was the domestic political context in which he was acting. Specifically, Bush wanted to be "for" missile defence because it was a key Republican issue.[18] Bush recognised the importance of retaining a significant ballistic missile defence programme to placate many conservative "Reaganite" Republicans who had not voted for him during the Republican primaries because they believed he would be soft on defence.[19] In fact, Bush demonstrated this propensity to play politics with missile defence during the 1988 election where he used the issue of BMD against his Democratic rival Michael Dukakis, after having played down the programme significantly while running against Jack Kemp in the Republican primaries.[20] Throughout his presidency Bush would continue to request high levels of BMD funding at least in part to meet this perceived domestic need. Consequently, the political necessity of the programme ensured that Bush would try to retain some type of large-scale missile defence plan during his presidency.[21]

Lastly, the president's views on BMD were shaped by his international strategy. Although Bush intended to be far more cautious towards the Soviet Union in general than Ronald Reagan, he was also determined that strategic nuclear arms reductions agreements with Moscow, and later the safe transition of the country after the collapse of the Soviet Union, were his key priorities.[22] In keeping with this air of caution, Bush was also determined to ensure against a recidivist Soviet

[16] According to Gordon Mitchell, "Members of the new Bush administration sought to carve out the basis for a more pragmatic missile defence program by distancing themselves from Reagan's heady Star Wars vision". Mitchell (2000) 77

[17] Interview with Baker Spring (30th June 2010)

[18] Interview with Walt Slocombe (3rd August 2010)

[19] Gerald Boyd, "Bush is cautious about deploying a missile defense", *New York Times,* (26th August 1988); Bill Peterson, "Bush acts to reassure conservatives on SDI; nominee surprised commitment is doubted", *The Washington Post,* (31st August 1988)

[20] "Presidential debates between Governor Michael Dukakis and Vice President George Bush", *Federal News Service,* (25th September 1988). During one of the debates with Dukakis Bush declared that he would "not make cuts in strategic defense programs" because he believed that "the jury was still out on the Soviet experiment".

[21] According to Edward Reiss, "To have slashed the SDI budget below $2.5bn without providing alternatives would have antagonised powerful forces". Edward Reiss, "The Strategic Defense Initiative", (Cambridge, Cambridge University Press: 1992).

[22] Interview with Baker Spring (30th June 2010)

Union, particularly during 1989 and 1990 when he thought that Mikhail Gorbachev may be re-energising the country, but also after 1991 as he continued to hedge against any future threat from Russia or elsewhere. Throughout this period, securing better and more stable relations with Moscow would dominate Bush's strategic thinking, as would reductions in the vast ex-Soviet nuclear stockpile.[23] Consequently, while BMD would be important to Bush, it would not be a key priority on his international agenda. Instead maintaining the ABM Treaty would be central to US-Russian relations and to US foreign policy as a whole.

Bush supported the development and deployment of ballistic missile defences, partly because of the programmes' domestic salience with Republicans, and partly because he remained cautious about the future, but not if pursuing the policy undermined his wider strategy. This was also very much in keeping with Bush's overall approach to the presidency, which was characterised by his pragmatic approach to governing, and a tendency to be cautious and reactive.

Congressional pressure on policymaking

Attitudes towards missile defence in Congress had been fundamentally split by the announcement of the Strategic Defense Initiative in 1983, and Democrats and Republicans would spend much of the 1980s locked in zero-sum arguments over the programme. This partisan fervour remained strong in 1989, and as a result, the direction of Congressional pressure on policymaking between 1989 and 1993 and funding of its components would depend heavily on which party controlled Congress.

During this period, the majority of Democrats in Congress were united in the belief that the ABM Treaty was of central importance to US and international security.[24] Consequently, they were staunchly opposed to any type of missile defence plan that would contravene the Treaty and upset

[23] See Goldgeier & McFaul (2003) 9. "As the Soviet Union waned, Bush was most concerned with maintaining global stability and less concerned with promoting freedom within the Soviet Union Russia" … "the fundamental challenge was how to manage a peaceful transition from the world we knew to the new world order".
[24] Confidential interview (B)

this balance. Democrats not only questioned the strategic prudence of deploying national missile defences, but also doubted that the technological capability to build such a defence existed, and after the collapse of the Soviet Union, argued that there simply wasn't any strategic need for them. Instead, lawmakers tended to point to other methods of ensuring US security as being more viable, effective, and less damaging to international stability. Nevertheless, Democrats were not against missile defences per se. In fact, some lawmakers agreed that the development and deployment of tactical battlefield missile defences was both prudent and necessary – especially after 1991 – and some even supported the idea of a limited national system as long as it remained within the confines of the ABM Treaty.[25] As such, views within the party did vary, with some "arms controllers" such as Representative John Conyers (D-MI) being staunchly opposed to any BMD deployment, while others such as Senator Sam Nunn (D-GA), were more inclined to accept a limited deployment within the ABM Treaty.[26]

At the same time, the Republican Party remained far more supportive of the idea of ballistic missile defence, and particularly towards the notion of deploying a comprehensive system such as that outlined by Ronald Reagan. Overall, they agreed with their Democratic Party colleagues that the US should develop and deploy battlefield missile defences, but unlike the Democrats, argued that the US should also pursue national systems to protect the whole country against all types of missile threat.[27] Underlying this was the fact that Republicans were far less concerned about the ABM Treaty and relations with Russia, particularly following the collapse of the Soviet Union, and were generally far more optimistic about the technological feasibly of deploying workable missile defences.[28] Nevertheless, attitudes towards missile defence within the party were split between

[25] See Michael Krepon, "Nunn's modest SDI", *Bulletin of the Atomic Scientists*, 5:3 (1988) pp5
[26] Ibid; Confidential interview (B)
[27] See Malcolm Wallop, "What SDI consensus?", *Comparative Strategy*, 12:1 (1993) pp67-70: 67
[28] According to Major Garrett, Conservatives believed that "Democrats were standing in the way of a program that could prove vital to America's national defense because of their 'nickel and diming' and because they were unnecessarily clinging to the ABM Treaty". Garrett (2005) 199.

"fiscal conservatives" who questioned the cost of such an endeavour and "hawkish conservatives", such as Senator John Kyl (R-AZ), who favoured deployment no matter what.[29]

The fact that the Democrats controlled both Houses of Congress between 1989 and 1993 meant that Congressional pressure on missile defence would generally favour scrutiny, restraint, and above all, continued adherence to the ABM Treaty. However, because of the nuances within both parties, and their propensity to "play politics" with the issue, Congress would not necessarily be entirely opposed to the idea of missile defence, and most lawmakers agreed on the need for battlefield defences.[30] In the words of Senator Malcolm Wallop (R-WY) at the time:

> A majority in Congress committed to the entire Strategic Defense Initiative does not exist. On the other hand, virtually no opposition to the concept of theatre missile defence remains.[31]

(2) The evolution of policy, 1989-1993

George H. W. Bush assumed the presidency at a pivotal time in the history of US ballistic missile defence policy. The threat of a nuclear confrontation with the Soviet Union appeared to be abating, much of the missile defence technologies that had emerged from the Strategic Defense Initiative were faltering, and a Democratic controlled Congress remained sceptical of large scale missile defence plans. In addition to this, any US BMD effort continued to be constrained by the Anti-Ballistic Missile Treaty, and by the quest for arms reductions and stable relations with the Soviet Union. As such, one scholar thought that as Ronald Reagan left office in 1989, "SDI might … ride off into the sunset with him".[32]

[29] Confidential interview (D)
[30] Confidential interview (B)
[31] Wallop (1993) 67
[32] Lakoff (2008) 120

1989: Missile defence as a bargaining chip

As the new administration entered office in January 1989, the SDI programme was in a considerable state of flux, and numerous important decisions crucial to the future of the system were required almost immediately.[33] Foremost amongst these were questions over what role SDI would play in US defence strategy under Bush; how much SDI expenditure could be countenanced in a period of low and declining defence budgets; whether the Phase I Strategic Defense System deployment envisioned by the Reagan administration should go ahead as planned; and lastly what the Bush administration's position was going to be in relation to the ABM Treaty.[34] In addition to this, the SDI programme was coming under increasing attack from those in the defence and engineering community who did not consider the construction of a cost-effective, survivable and impenetrable defence as a current reality.[35] Even the Joint Chiefs of Staff were quoted as being "as fond of SDI as they are of peace protests"[36], and were concerned that SDI was taking up valuable resources that might be better used on other service-specific projects.[37] On top of this, the programme was also running into trouble with the Democratically controlled Congress who warned that the Strategic Defense Initiative was blocking the way towards the more important goal of arms control agreements with the Soviet Union.[38]

With these changing dynamics in mind, the Bush administration took its time in assessing the international scene, and remained cautious about how to approach BMD. Bush, and Secretary of State James Baker in particular, remained deeply sceptical about Mikhail Gorbachev's reforms, fearing that they may be designed to reinvigorate the Soviet Union as a more powerful foe, and therefore expressed caution towards the new peace overtures from Moscow.[39] This thinking and worldview was reflected in something of a wait-and-see SDI policy, keeping research and the

[33] Steve Smith, *"US defence: the Reagan legacy and the Bush predicament"* chapter in Michael Pugh & Phil Williams, *"Superpower politics: change in the United States and the Soviet Union",* (Manchester, Manchester University Press: 1990) 73
[34] Ibid
[35] Mitchell (2000) 76
[36] Fred Barnes, "Pebbles go bam-bam", *The New Republic,* (17th April 1989)
[37] Lakoff (2008) 120
[38] Sanford Lakoff (2008) 120
[39] Ibid 122

notion of deployment going if only as a hedge and bargaining chip for an uncertain future. In fact, Bush waited five months before he first contacted the Soviet leader, undoubtedly waiting to see how things would unfold, and took his time to examine the role of SDI in the US-Soviet relationship.[40] In keeping with this air of caution and circumspection, Bush declared that he would "vigorously pursue the strategic defense initiative" during his inaugural address to Congress on 9th February 1989.[41]

In his first defence budget, Bush asked Congress to appropriate $4.6b for further SDI research and development, which although substantially less than the $5.6b proposed by the outgoing Reagan administration for the same period, still amounted to a sizable request in an era of decreasing defence spending.[42] Of particular note, Bush requested substantial additional funding for a programme called Brilliant Pebbles, the latest in a long line of revolutionary BMD ideas from Edward Teller and Lowell Wood at the Lawrence Livermore National Laboratory in California.[43] Many in the Bush administration, and in particular Vice President Dan Quayle, who had described the idea as "one of the most promising lines of SDI research", which had the capacity to "revolutionize much of our thinking about strategic defense", saw the Pebbles not only as a great breakthrough in terms of technology, but equally importantly perhaps in terms of cost.[44] The concept would involve placing several thousand small interceptors and sensors in continuous space orbit in something of a "swarm", which would then be able to locate, track and eventually intercept enemy ICBM's travelling at high speed through space. Teller and Wood envisaged a system containing anything up to 100,000 Pebbles, which in turn would then be backed up by additional ground-based elements, and estimated that the cost of deployment could be as little as £10b.[45]

[40] Burns & Brune (2003) 132
[41] George HW Bush, *"Address on administration goals before a joint session of Congress",* (9th February 1989)
[42] Gordon (19th April 1989); Barnes (26th Jun 1989); William Broad, *"Tellers war: behind the scenes of the Star Wars deception",* (London, Simon & Schuster: 1992) 262
[43] Richard Holloran, "As Pentagon budget unfolds space missile shield is in tact", *New York Times,* (2nd March 1989); Michael Gordon, "Aides say Bush nears a decision on course of star wars program", *New York Times,* (24th April 1989)
[44] Quoted in Broad (1992) 260
[45] Broad (1992) 245-6

According to the then Director of the Strategic Defense Policy Office Stephen Cambone, the Brilliant Pebbles concept was exactly the type of project that Bush was likely to favour; not only did it appear more credible than many of the technologies under development at the SDIO, but it appeared to offer the potential of a cost-effective, efficient and comprehensive system.[46] The new concept also received a wholehearted endorsement in an end of tour report submitted by SDIO Chief General James Abrahamson in late February 1989. Abrahamson, who had headed the agency since April 1984, recommended that the SDI programme be restructured to "incorporate, elevate and prioritize" Brilliant Pebbles as the centrepiece of the administration's anti-missile research effort. If this was done, he suggested, the new system could potentially begin providing limited protection against enemy ICBM attack as early as 1994.[47] Bush now began to entertain the possibility of pursuing a system based around Brilliant Pebbles that showed great promise, and could apparently be done at a limited cost. Although SDI would remain secondary to other priorities during the first half of 1989, the new idea certainly shaped BMD thinking within the Bush administration, and made the president far more receptive to BMD than he had been before.[48] Nevertheless, BMD policy remained constrained by the ABM Treaty and by the importance of relations with Moscow.

On 14th June 1989, Bush's new approach was formalised in National Security Directive 14, which concluded that the administration's original SDI policy "remained sound" and "should continue to be a major US response to the Soviet challenge," and stated that the SDIO research and development effort should intensify its focus on Brilliant Pebbles.[49] The Directive also made it clear that the Bush administration accepted that the goal of the SDI was no longer to build an impenetrable shield, but to "enhance deterrence"; the first public break with Reagan's desire to

[46] Interview with Stephen Cambone (5th August 2010). According to Cambone, Secretary of Defense Dick Cheney and SDIO Director Henry Cooper were also very important in persuading the president of this new idea.
[47] Burns & Brune (2003) 135
[48] Interview with Stephen Cambone (5th August 2010)
[49] Donald Baucom, "The rise and fall of Brilliant Pebbles", *The Journal of Social, Political and Economic Studies,* 29:2 (2004), pp143-190: 154-5

create an impenetrable shield over the United States.[50] Technological endorsements from the JASON group[51], the US Air-Force and the SDIO all served to augment the Brilliant Pebbles concept in the eyes of the administration. Despite this, Bush privately continued to regard SDI as a dispensable tool for use in negotiations with the Soviet Union.[52]

Thanks in part to this newfound confidence in SDI, Bush felt able to stand firm in his first meeting with Gorbachev as president in the Belgian capital, Brussels, during June 1989.[53] After testing the water during this initial meeting, a couple of months later Soviet Foreign Minister Eduard Shevardnadze visited the US with new ideas to push ahead with an arms reduction deal. Upon arrival in Washington, Shevardnadze presented Bush with a nine page letter from Gorbachev that seemed to suggest that talks over START might finally be separated from issues over missile defence, and in particular from the contentious issue of space weapons.[54] The letter, though not dealing in any specifics, suggested that the "conceptual argument about placing weapons in space" should be set aside for the moment in order that the "more important and complex debates on arms control not be made any harder" than they already were.[55] A few days later, as Shevardnadze met Secretary of State James Baker for further discussions at Jackson Lake Lodge in Wyoming, the Soviet Foreign Minister officially announced that the Soviet Union would no longer insist that advances in strategic arms reduction talks be linked to agreements and limitations on SDI. He was however quick to point out that any US move that breached the ABM Treaty would invalidate this promise.[56] For the Soviet Union this decision was as much about practical politics as it was about

[50] "Bye, bye, SDI?", *The National Journal* (16th September 1989)
[51] The JASON group are an independent group of scientists who evaluate the feasibility of various military technologies. For more on the group see Anne Finkbeiner, *"The Jasons: the secret history of science's post-war elite",* (New York, Viking 2006)
[52] Baucom (2004) 156-7
[53] R. Jeffrey Smith, "No shift on missile defense foreseen; officials predict rejection of JCS proposal before talks with Soviets", *The Washington Post,* (9th June 1989)
[54] Michael Beschloss & Strobe Talbott, *"At the highest levels: the inside story of the end of the Cold War",* (London, Little Brown and Company: 1993) 117-119
[55] SDI had been a significant impediment to START right from the beginning, and was largely the reason that the 1986 Reykjavik talks stalled, and why progress had not been made since. For more on this see Kerry Kartchner, *"Negotiating START: strategic arms reduction talks and the quest for strategic stability",* (New Jersey, Transaction Publishers: 1992).
[56] Martin Walker, "Moscow concessions signal progress towards arms cuts", *The Guardian,* (25th September 1989); R. Jeffrey Smith, Debate erupts over Soviet arms control proposal", *The Washington Post,* (1st October 1989)

any major change in strategy, but for Bush the concession meant a validation of his cautious wait-and-see policy, and having achieved its primary purpose of facilitating arms cuts, SDI lost some of its importance to his overall strategy. As long as SDI wasn't needed to force Gorbachev to the negotiating table, Bush did not need to prioritise it, but that did not mean that the president would abandon the project altogether. In December, Bush met Gorbachev to discuss the Strategic Arms Reduction Treaty (START).[57]

Bush was intent on retaining SDI funding at a high level, in part as a hedge and bargaining chip with the Soviet Union, and therefore a key litmus test of the president's commitment would be whether he could persuade Congress to fully fund BMD in his 1990 defence budget.[58] Things seemed to start well in the Senate as a provisional vote authorised nearly the entire SDI request, and despite funding being cut further to $4b during internecine summer debates, the Senate finally agreed to authorise $4.6b for the programme. Sam Nunn (D-GA), Chairman of the Senate Armed Services Committee, made it clear that SDI "remained a valuable research programme" and that the Senate had no intention to "kill it entirely".[59] The passage of the budget through the House was far less smooth as lawmakers initially voted to cut SDI funding to just $3.1b – nearly a third less than had been asked for – and added strong language restricting the testing of various programmes currently being pursued by the SDIO, and reaffirmed the commitment to the ABM Treaty. During the summer, Bush had described this as "totally unacceptable", while the SDIO warned that such levels of funding would "essentially dismantle the whole programme".[60] When the budget went to conference, Secretary of Defense Dick Cheney threatened to instruct the president to veto any resolution that promised to hamstring SDI research and development.[61] Nevertheless, Bush agreed to the figure of $3.6b for SDI in fiscal year 1990, a 22% reduction of the administration's request

[57] For more on the Soviet arms control proposals and the de-linking of START and SDI in 1989 see Beschloss & Talbott (1993) 112-120
[58] Holloran (2nd March 1989)
[59] Donna Cassata, "Senate restores star wars funding, approves military spending", *Associated Press*, (29th September 1989)
[60] "House SDI funding would dismantle the program", *SDI Monitor* (18th September 1989)
[61] Broad (1992) 262. In particular, Cheney thought it was imperative to continue funding the development of Brilliant Pebbles, "the concept is sound", he suggested, "we can build it, in short it may well be a winner".

and a real terms reduction from the previous years budget, despite warnings from the SDIO that such a reduction in funding would necessitate a significant rethink of current BMD research and development strategy, and perhaps its entire rationale.[62]

The appropriation marked a tangible drop in support for the SDI programme, and reflected the changing circumstances and attitudes both internationally and domestically. Perhaps more importantly it reflected Bush's pragmatism. In early summer as he remained cautious about the Soviet Union he pushed for greater SDI funding, and even spoke out against the House resolution, but by late autumn as Congress voted for a large reduction in funding, Bush didn't follow through with a veto, neither did he come out publicly and criticise the Bill.[63] A central reason for this was the delinking of START and SDI by the Soviet Union, after which missile defence lost importance for Bush, and consequently the president felt much less inclined to force, lend weight to, or use up political capital on SDI in late 1989. In the words of Ernest Yanarella:

> The Bush Administration's initial efforts to distance itself from the Reagan presidency and its legacy prompted some of its key players – including the president himself – to put ballistic missile defense on the backburner.[64]

1990: The changing rationale for missile defence

In early 1990, Bush asked Congress for $4.5b for SDI, only marginally less than the previous year, and over $850m more than had been appropriated just a few months earlier. The request reflected Bush's growing enthusiasm for the potential of Brilliant Pebbles. Consequently, a large proportion of the SDI budget, £392m, would be requested for the Brilliant Pebbles system, which in turn would make it one of the biggest programmes in the Pentagon's research budget.[65]

Although Bush had been very interested in the promise of the Brilliant Pebbles concept during 1989, a report by Ambassador Henry Cooper almost certainly persuaded Bush to increase

[62] "Budget cuts force hard questions on SDI goals", *SDI Monitor,* (10th November 1989)
[63] Ibid
[64] Yanarella (2002) 199
[65] R. Jeffrey Smith, "Pentagon increases SDI push", *The Washington Post,* (18th February 1990); Broad (1992) 262

both its funding and centrality to the SDI project in his budget request.[66] Cooper's report, which had been mandated nearly a year earlier, contained a strong endorsement of the concept, and suggested that Brilliant Pebbles was not only "cost effective, affordable and survivable" but also, unlike many other SDIO projects, the technology was not constrained by identifiable "major road blocks" in development.[67] Cooper also suggested that a new strategic order was developing in which different types of threats would emerge from a now more restive and less secure Soviet Union and from the proliferation of ballistic missile technology to hostile third world states. In accordance with this transformation, Cooper proposed that the SDI project be reconfigured to take into account the new threat from accidental or unauthorised ICBM launches, primarily from the Soviet Union, and from deliberate attacks by rogue states.[68]

Accordingly, the SDIO began to put together a project and possible system architecture, and Bush began to speak more effusively about this new approach to SDI. In particular, as part of a speech to the staff of Lawrence Livermore National Laboratory in San Francisco during February 1990, Bush remarked that "I am told the technology looks very promising" and that "these technologies will strengthen deterrence" in an era where "strategic defense makes more sense than ever before". He also stressed that strategic defences continued to underpin arms control by diminishing the advantages of "cheating", while also enabling a capacity against "accidental or unauthorized launches".[69] In March 1990, on the seventh anniversary of Ronald Reagan's announcement of the SDI, Bush stated that his administration "remained committed to a robust SDI program" in order to defend "the US and its allies against ballistic missile attack", which he said was increasingly likely to be from a "third world power".[70] This thinking was reiterated a month later by SDIO Chief George Monahan (February 1989 - June 1990), as he stressed to *SDI Monitor* that the role of SDI in the 1990s would remain guided by the principles of NSD 14, and that

[66] Baucom (2004) 164
[67] Ibid
[68] Lakoff (2008) 122; Baucom (2004) 164
[69] George HW Bush, *"Remarks to staff of Lawrence Livermore National Laboratory",* (7th February 1990)
[70] Bush (23rd March 1990)

Brilliant Pebbles had become the centrepiece of this plan.[71] Shortly after the interview, Monahan officially substituted Brilliant Pebbles for the Phase I SDS system.[72] Confirmation of this new approach was made in Bush's 1990 National Security Strategy, which as well as talking at some length about how the international landscape was rapidly changing, and how a crisis in Communism and the spread of weapons of mass destruction was underpinning a strategic transformation, also spoke of how SDI offered the opportunity to "shift deterrence towards a more stable basis".[73] In particular, the document stated that "defense against third country threats" has become an "increasingly important benefit" of SDI, and that the US should entertain the possibility of BMD cooperation with the Soviet Union and NATO allies.[74]

Several things conspired during the summer and autumn of 1990 to counter Bush's newfound faith in the potential of SDI. The first was the gradual realisation that the Brilliant Pebbles system, which had become the central component of Bush's BMD planning, was proving to be far more complicated and expensive than had originally been hoped. In particular, the SDIO was beginning to realise that more reliance would need to be placed on the ERIS ground-based interceptor because the Pebbles had essentially become boulders. Instead of the original estimate that each Pebble would weigh around 5lbs and that each could be held in the palm of the hand, developers now reported that each Pebble could be up to 3ft long and weigh closer to 100lbs per unit. Accordingly, the price per Pebble rose from $100,000 per copy to nearer $1.5m, and the proposed cost of the whole system rose substantially, and with it went some of Bush's support.[75] The Brilliant Pebbles system was tested for the first time on 25th August and failed the objectives set due to faulty telemetry, providing only "tangential benefits".[76]

The second development was the fact that during the summer and autumn of 1990, Bush focused his time and attention on other priorities that he considered more important than SDI. The

[71] "Q&A: Monahan examines the future of SDI", *SDI Monitor,* (16th March 1990)
[72] Burns & Brune (2003) 136
[73] George HW Bush, *"Statement on the seventh anniversary of the Strategic Defense Initiative",* (23rd March 1990)
[74] Ibid
[75] Burns & Brune (2003) 136
[76] Baucom (2004) 166-7

first of these was the conclusion of negotiations of the CFE Treaty with the Soviet Union regarding the reduction of conventional armed forces in Europe.[77] This agreement was followed by additional promises by the Soviet Union to withdraw all short-range nuclear missiles from Europe, and by Bush's announcement that the US would withdraw all land and sea-based tactical nuclear weapons from oversees by 1991.[78] The second distraction was the invasion of Kuwait by Iraq in August 1990, an event that was to dominate Bush's time over the next six months as the president worked to coordinate an international response to the attack. In fact, Bush spent much of the second half 1990 putting together an extensive coalition to first protect against any further Iraqi aggression in the Gulf, and then in January 1991 to expel Iraqi forces from Kuwait.[79]

The combination of technological problems with the SDI and Bush's international diplomatic workload was reflected in the way that the president's SDI request was handled by Congress. Nothing seemed to suggest that the Congressional mood had changed much from the previous year, and much, such as relaxing tensions with the Soviet Union and the increasing cost of any proposed system, seemed to suggest that the SDI request would face an even tougher time in 1990. In particular, both Houses of Congress remained staunchly against any plans that went beyond the confines of the ABM Treaty, particularly Brilliant Pebbles.[80] With this in mind, the Senate agreed $3.6b for SDI, $1b less than Bush had asked for, while the House slashed funding to $2.3b, and included language threatening to veto funding for Brilliant Pebbles altogether.[81] The October conference agreed $2.89b for SDI, cutting over $1b from the previous year's appropriation, and over a third from Bush's request, representing the lowest SDI funding for five years.[82] Despite strong opposition from House Republicans led by John Kyle (R-AZ), who urged Bush to veto the Bill, exclaiming that it would send "exactly the wrong signal to the Saddam Hussein's of this

[77] Garber & Williams in Hill & Williams (1994) 209
[78] Burns & Brune (2003) 148
[79] For more on this see Lawrence Freedman & Efraim Karsh, *"The Gulf conflict 1990-1991",* (London, Faber & Faber Ltd: 1993) or Jean Edward Smith, *"George Bush's war",* (New York, Henry Holt Company: 1992)
[80] "SDI's $4.4bn request faces though time on the Hill", *SDI Monitor* (2nd February 1990)
[81] Cassata (8th October 1990); "Hill baits Bush with SDI restrictions", *SDI Monitor* (14th September 1990)
[82] "Congress to cut SDI funding to $2.89bn", *SDI Monitor* (26th October 1990)

world" and pointing to the "juicy bits of SDI-related veto bait", Bush signed the Bill into law.[83] However, Congress did vote to establish a Theatre Missile Defense Office and programme in the Pentagon to coordinate the development of various TMD technologies.[84] In a fair summation, SDIO Director Henry Cooper later remarked that SDI did not get the presidential attention or the funding that it needed because Bush had "bigger fish to fry" in 1990.[85]

By the end of 1990, prospects for SDI deployment seemed low; the technology was faltering, the Soviet threat was decreasing, and the Democratic Congress did not want to fund it. Bush's approach to SDI had remained cautious and pragmatic both before and after his election, and this had been reflected in the development of the programme during this period. Although certainly interested in the initial promise of Brilliant Pebbles, SDI was of secondary importance to Bush, and was often used as a political bargaining chip, both domestically and internationally, and funding was retained more as a future hedge against the unknown than for any specific strategic purpose. At key points Bush didn't give SDI the support it needed, particularly after strategic defences were delinked from START in summer 1989, but perhaps even more so as he concentrated on other priorities in 1990. The gradual decline in SDI funding was an indicative and inevitable consequence of this.

1991: GPALS and the Missile Defense Act

Despite the significant cuts imposed by Congress on SDI funding, and the start of hostilities against Saddam Hussein in the Gulf, by January 1991 Bush felt confident enough to publicly release his proposed BMD plan. The new plan, which had been driven largely by SDIO Director Henry Cooper, would be known as the Global Protection Against Limited Strikes (GPALS).[86] The

[83] *SDI Monitor* (14th September 1990)
[84] Mira Duric, "*The Strategic Defence Initiative: US policy and the Soviet Union",* (London, Ashgate Publishing: 2003) 143
[85] "This is SDI's make or break year: interview with SDIO director Henry Cooper", *SDI Monitor,* (5th July 1991)
[86] Baucom (2004) 168

GPALS system, designed primarily as a hedge against future threats and in order to bolster not replace nuclear deterrence, proposed a combination of around 1000 Brilliant Pebbles with 500 or more ERIS based ground and sea-based interceptors. Although representing a substantial lessening of demands from the Phase I SDS plan, the new system would still amount to a considerable outlay of untested and unproven components, and more importantly, if deployed, a breach of the ABM Treaty.[87] GPALS was based around, and was heavily reliant upon the space-based Brilliant Pebbles, which the SDIO claimed were needed because only the Pebbles could provide continuous protection of a significantly broad area, which in turn could be extended to friends and allies, and could offer additional capability to theatre BMD.[88] In the process of recalibrating the system, Bush also ended any pretence that the SDI programme could destroy thousands of incoming enemy warheads by constructing an impenetrable missile shield above the US. The new system would be designed primarily to counter the accidental and unauthorised launches of up to 200 Soviet warheads, as well as a possible single figure warhead attack from a nations like Iran, Iraq or North Korea.[89] The system therefore offered the possibility of a comprehensive and relatively robust defence, and at the same time a method to enhance the president's support within the Republican Party.[90]

When Bush announced the new programme in late January 1991 during his State of the Union address, he proclaimed that it was now possible to "defend against ballistic missile attacks aimed at innocent civilians". Consequently, he had:

> Directed that the SDI program be refocused on providing protection from limited ballistic missile strikes, whatever their source. Let us pursue an SDI program that can deal with any future threat to the United States, to our forces overseas, and to our friends and allies.[91]

Bush's new programme had little support in Congress; relatively pro-BMD Democrats were quick to criticise the new plan for its reliance on Brilliant Pebbles, which would violate the ABM treaty,

[87] Burns & Brune (2003) 138
[88] "The president's new focus for SDI: global protection against limited strikes", *US Strategic Defense Initiative Organization (SDIO)*, (6th June 1991)
[89] Burns & Brune (2003) 136-7
[90] See SDIO (6th June 1991)
[91] George HW Bush, *"Address before a joint session of Congress on the state of the Union",* (29th January 1991)

while most Republicans, and especially those who had supported Ronald Reagan, felt that Bush's new plan compromised and delayed the possibility of ever constructing a genuine and more robust missile defence system.[92] Bush had essentially attempted a political compromise with GPALS and had ended up pleasing neither side of the debate, or even those supportive of the compromise. According to Robert Bell, then aid to Senator Sam Nunn (D-GA), this left Bush getting "shot at from both sides".[93]

However, attitudes towards BMD, particularly amongst Democrats in Congress, were changed substantially during 1991 by visual reports from the Gulf War apparently showing an American Patriot missile defence system intercepting Iraqi Scud missiles over Israel and Saudi Arabia. The American public was deeply impressed by the apparent high-speed intercepts captured by TV reporters, as for the first time in its 50-year history a BMD system had ostensibly been proven to work. Despite being an entirely different concept to the system being developed by the Bush administration to protect the US homeland, the affect on Congress and on the public perception of BMD was immediate and striking. During a speech in mid-February, Bush exclaimed that the events in the Gulf were "something of a revolution that will shape the way that America defends itself for decades to come", because Patriot was "proof positive that missile defense works".[94] Many SDI proponents immediately began proclaiming that Patriot demonstrated the validity of Ronald Reagan's Star Wars vision. Many moreover used the popularity and apparent success of the system to pressure Congress into backing a renewed burst of BMD funding.[95]

Armed with this new wave of enthusiasm Bush proposed to increase SDI funding by almost 60% in his fiscal year 1992 budget request, asking Congress for $5.2b for the SDIO, which would include $659m for Brilliant Pebbles, and $158m for Patriot.[96] The request was telling in many

[92] Burns & Brune (2003) 138
[93] Interview with Robert Bell (6th March 2010)
[94] George HW Bush, *"Remarks to Raytheon missile systems plant employees in Andover, Massachusetts",* (15th February 1991)
[95] Garrett (2005) 196; Burns & Brune (2003) 139
[96] "Bush seeks large increase for strategic, tactical ballistic missile defense", *Aviation week & Space Technology,* (11th February 1991); Burns & Brune (2003) 139

ways, not least that Patriot was to receive such a small proportion of the funds considering its role as the driver of the renewed enthusiasm for BMD.[97] The second interesting facet was the large amount requested for Brilliant Pebbles, a concept with very little if anything in common with Patriot. Without question the Bush administration, and particularly its more right-leaning supporters in Congress, hoped to use the impact of Patriot to drive through the GPALS plan.[98]

GPALS encountered significant opposition from Congressional Democrats in spring 1991, as lawmakers remained unconvinced about the prudence, necessity and desirability of Brilliant Pebbles. Senator John Kerry (D-MA) argued that the Pebbles would "threaten the ABM treaty" long before they would threaten missiles such as Iraqi Scuds, and was quick to point out that "Patriot should not be used as a justification for the grandiose, costly and destabilizing SDI program which the Bush administration continues to propose".[99] On the other side of the divide, missile defence advocate Frank Gaffney argued that it was "politics not technology", that was preventing the US from deploying a protective missile shield.[100] Even Bush declared that he believed that the pace of SDI research had been "limited not by technological difficulties" but by Congresses unwillingness to fund the programme adequately throughout the previous few years.[101]

While the debate was heating up in Congress, evidence emerged suggesting that the Patriot BMD system had not been as successful as had originally been claimed. In mid-1991, Theodore Postol, Professor at the Massachusetts Institute of Technology, presented findings to the House Armed Services Committee showing that Patriot's performance had been at best overstated and at worst negligible. Part of the problem, Postol argued, was that journalists reporting on the war were frequently reporting directly from US Army sources and were therefore often unable to access any

97 In fact, according to Francis Fitzgerald, "The SDIO had shown no interest in Patriot since it could not defend the United States". Francis Fitzgerald, *"Way out there in the blue: Reagan, star wars and the end of the Cold War",* (London, Simon & Schuster: 2001) 486
98 Mitchell (2000) 123
99 Quoted in Garrett (2005) 197
100 Ibid 198-9
101 George HW Bush, *"Statement on the Strategic Defense Initiative",* (22nd March 1991)

contradictory evidence.[102] In his report, Postol claimed that US Army information on Patriot's success had been "severely inflated" and that the system was not nearly as successful as the US public had been led to believe. Although acknowledging the psychological importance of Patriot, and its importance in keeping Israel out of the Gulf War, Postol cast significant doubts on the efficacy of the system, and expressed his concern that SDI advocates were deliberately "learning the wrong lessons" from the experience.[103]

In early May the SDIO released its exact GPALS architecture, and despite concerns in Congress about Brilliant Pebbles, the architecture would continue to be built around the space-based assets. Although SDIO Director Cooper maintained that the Pebbles would not be deployed for many years, they remained the cornerstone of the new system.[104] Unsurprisingly this did not go down well in the House, where despite the best efforts of the minority Republicans to staunchly defend the renewed push for SDI, and its focus on Brilliant Pebbles, Democrats remained unconvinced.[105] Consequently in late May the House voted for a 32% reduction in the administration's SDI request for fiscal year 1992. Perhaps of even more concern, and despite the best efforts of Republican lawmakers John Kyle (R-AZ) and John Spratt (R-SC), the Bill also eliminated all funding for Brilliant Pebbles, fundamentally undermining Bush's GPALS plan.[106] During the process, Representative John Conyers (D-MI) launched a scathing attack, reflecting the views of many Democratic representatives, arguing that the administration had been "successful in convincing Congress to give it billions of dollars for Star Wars" but the programme continued to "prove remarkably unsuccessful in producing much of anything with those funds". Conyers described the SDI plan as "pulling in effect a reverse Rumpelstiltskin [by spinning] gold into straw."[107] Consequently the Bush administration, and BMD supporters in Congress, were left in a

[102] Mitchell (2000) 126
[103] Theodore Postol (1991) 121. Robert Stein, a representative from Raytheon (Patriot's parent company) would challenge Postol's findings later in 1991. See Robert Stein & Theodore Postol, "Correspondence: Patriot experience in the Gulf", *International Security*, 17:1 (1992) pp199-240
[104] Baucom (2004) 171; *SDI Monitor* (5th July 1991); SDIO (6th June 1991)
[105] Garrett (2005) 198-9
[106] "House zaps Brilliant Pebbles", *SDI Monitor* (24th May 1991)
[107] Quoted in Garrett (2005) 198

quandary; the political support seemed to exist to push ahead with BMD development, but not if the proposed system continued to be based upon assets prohibited by the ABM Treaty (e.g. Brilliant Pebbles), which the SDIO maintained were integral to the strategic viability and working of the system. The question was therefore how to get a balance between the perceived strategic capability of Brilliant Pebbles and political support for an ABM Treaty compliant system.

As Bush turned his attention to other issues such as reaching an agreement with Moscow on START in early 1991, Republicans in Congress realised that Bush's current plan would not be accepted. Instead, leading Republican Senators William Cohen (R-ME), John Warner (R-VI) and Richard Lugar (R-IN) broke with the administration, and began trying to piece together a compromise BMD package that would be acceptable to both parties in Congress. The stumbling block was, and was always going to be, Brilliant Pebbles, and the Senators realised that any bi-partisan consensus on BMD deployment could only be reached by removing Bush's preferred concept from the proposal.[108] As a result, Cohen, Warner and Lugar proposed scaling back Bush's GPALS plan, postponing any deployment decision on Brilliant Pebbles, and as an alternative moving ahead with the deployment of ground and sea-based ERIS interceptors.[109] The proposal envisaged that the future system might consist of between 700-1200 interceptors that would eventually be deployed at up to seven sites around the US, but for the moment, plans would be restricted to one ABM Treaty compliant site at North Dakota.[110] The plan, which became known as the "basis for consensus", was accepted by Republicans keen to get some type of resolution on BMD, and also went down well with Democratic supporters of the ABM Treaty, and particularly with leading Senate Arms Services Committee Chairman Sam Nunn (D-GA), who himself had unsuccessfully proposed a similar idea named "Accidental Launch Protection System" (ALPS) in 1988.[111] As well as being equally impressed by Patriot and not wanting the Republican Party to "own" a popular issue, Democrats were conscious to comply with the new plan in order to make

[108] Eric Schmitt, "3 Republicans break with Bush over star wars", *New York Times*, (16th June 1991)
[109] Burns & Brune (2003) 147
[110] Ibid 138
[111] For more on this see "Mr Nunn's rash rush to ABM's", "*New York Times* (29th July 1991)

amends for their perceived hesitation in supporting the Gulf War.[112] Congress had also become concerned after several Senators who had visited Moscow reported that the Russians themselves were also growing increasingly anxious about a potential third world missile threat.[113] Fundamentally and most importantly, the Bill left ambiguous the prospect of any BMD deployments beyond the initial 100 interceptors at one site allowed by the ABM Treaty, although it did call for Bush to begin negotiations with Moscow on the necessary amendments.[114] The proposal received broad bi-partisan support in Congress.[115]

Despite it appearing to undermine GPALS, Bush remained conspicuously quiet on the "basis for consensus", spending most of the summer focusing on arms control negotiations with the Soviet Union. Consequently, moderate Republicans and Democrats joined in a pragmatic BMD compromise that made political rather than strategic sense, as they sought to push the Bill through Congress.[116] The Bill received a strong endorsement in the Senate, and the Armed Service Committee voted in July 1991 to fund the new system in place of GPALS.[117]

While Congress was debating, reworking and essentially undermining GPALS, the president seemed far more focused on other issues, much as he had been in 1990. In particular, Bush had devoted much of his time and energy over the summer to finalising the Strategic Arms Reduction Treaty (START) with the Soviet Union. The US had been working towards this agreement since 1982, but until recently, after Gorbachev had announced their delinking in 1989, agreements on arms reductions had always stalled due to American insistence on the freedom to pursue SDI, and Soviet insistence that SDI must remain within the confines of the ABM treaty and be linked to

[112] Confidential interview (B)
[113] David Denoon, *"Ballistic missile defense in the post-Cold War era",* (Oxford, Westview Press: 1995) 11
[114] Graham (2003) 19
[115] Schmitt (16th June 1991)
[116] The Bill represented a compromise because any credible missile defence system could not be based solely at North Dakota (because this site could not protect the entire country), and therefore would require ABM Treaty amendments to allow for a different site, or for more sites, in order to achieve this. However, the only reason that the Democrats had gone along with the legislation was because they believed that it wouldn't violate the ABM Treaty.
[117] Eric Schmitt, "Summit in Moscow: Senate votes to deploy Star Wars", *New York Times,* (1st August 1991)

START.[118] Finally presented with the ability to conclude these arms cuts, the last thing Bush wanted to do was to jeopardise them by opening up further discussions about SDI, and about possible amendments to the ABM Treaty. As a result, Bush refused to discuss any issues relating to the Treaty with Gorbachev whilst they finalised START during July.[119] Bush essentially prioritised better relations with the Soviet Union and cuts in strategic arms over pushing for GPALS.

The president continued to focus on the Soviet Union and arms control during the autumn, paying scant attention to what was happening domestically to his GPALS plan, particularly after the shock of the attempted coup against Gorbachev in August 1991. The coup cemented an already growing concern in Bush's mind over Moscow's control of its nuclear weapons, and caused him to up the pace of his arms control initiatives, which again put pay to any potential negotiations on the ABM Treaty, and instead began pushing for a START II agreement to further reduce both superpowers nuclear stockpiles.[120] In October, Bush announced that the US was willing to "give some ground" on Soviet desires to limit the Strategic Defense Initiative in order to build on and take maximum advantage of "the current climate of arms control negotiations".[121]

By late autumn the "basis for consensus" plan had passed through Congress, and had received wide political approval, and in November, Congress passed the 1991 Missile Defense Act making this plan into law. The Act made it an official goal of US policy to deploy at the "earliest possible date" allowed by the "appropriate technology", an ABM Treaty compliant missile defence system able to provide "a highly effective defence of the US against limited attacks of ballistic missiles".[122] It also called for any actions in pursuit of this goal to be in coordination with the goal

[118] For more on the START negotiations see for example Kartchner (1992); Don Oberdorfer, *"The turn: from Cold War to new era",* (New York, Poseidon Press: 1991); Beschloss & Talbott (1993)
[119] Burns & Brune (2003) 148
[120] Graham (2003) 20; Garber & Williams in Hill & Williams (1994) 209-10
[121] Richard Benedetto, "Bush willing to scale down star wars program", *USA Today*, (16th October 1991)
[122] Burns & Brune (2003) 143; Graham (2003) 21

of "maintaining strategic stability", and alongside the provision of "highly effective theatre missile defenses".[123] Most importantly, it stated that:

> Nothing in this Act may be construed to imply Congressional authorization for development, testing or deployment of anti-ballistic missile systems in violation of the ABM Treaty, including any amendments or protocols thereto.[124]

This meant that the Bush administration could not deploy Brilliant Pebbles, the cornerstone of GPALS.[125] In light of this, the Missile Defense Act called for the SDIO to submit a report to Congress on how it intended to implement the provisions in the Bill, and to rearrange GPALS to meet these new Congressional demands.[126]

The political manoeuvring over the shape and architecture of the proposed BMD system was reflected by the Congressional amendments to Bush's defence budget. Although Congress agreed after conference to provide the SDIO with $4.15b, the highest ever appropriated and over $1b more than the previous year, the funding was structured to reflect the exigencies of Congressional BMD thinking and not those of the Bush administration. Brilliant Pebbles was allocated $390m, about half the amount requested, and funds were stipulated solely for research and development and not deployment, while theatre missile defence programmes received $850m, reflecting the change in priorities mandated by the Missile Defense Act.[127]

The 1991 Missile Defense Act, although hailed as a great step forward for BMD, was essentially an inefficient compromise that looked unlikely to hold. Democratic lawmakers had gone along with the idea on the understanding that any deployment would not violate the ABM Treaty, while the Bush administration remained committed, at least in principle, to its Brilliant Pebbles centric GPALS architecture.[128] There was also a definite feeling that Democrats had agreed to the legislation because they were concerned about the harm that had been done by not

[123] NR2100, *"The National Missile Defense Act of 1991",* (December 1991)
[124] Ibid
[125] Denoon (1995) 137-8
[126] Henry Cooper, "Unsteady evolution of the emerging consensus on SDI", *Comparative Strategy*, 21:1 (1993), pp25-35: 27
[127] "Conference authorizes $4.14bn for SDI in 1992", *SDI Monitor* (8th November 1991)
[128] Graham (2003) 21

appearing sufficiently robust on national security issues both before and after the Gulf War, and also because they did not want to let Republicans dominate an issue which seemed to have broad political support.[129]

Despite what appeared to be significant breakthroughs for SDI in 1991, a closer inspection reveals a Congress and president working at essentially different purposes. Fundamentally, because the one permitted NMD site in North Dakota had never been intended to house interceptor missiles capable of protecting the US population, the Act presented a significant political and strategic problem, namely that any credible national missile defence system would need to either be deployed elsewhere, or more likely, at several different sites within the US. Both of these options would require ABM Treaty amendments.[130] The Missile Defense Act therefore amounted to little more than a political compromise, which created more problems than it solved in practical terms, and always looked like a temporary rather than permanent arrangement.

1992: The beginning of the end for SDI

In December 1991, the Soviet Union collapsed, and the Cold war structure that had dominated international politics for over a generation ceased to exist. The collapse ushered in a new era of Russian leadership as the "radical" Boris Yeltsin replaced the "reformist" Mikhail Gorbachev. Both developments seemed to promise much for peaceful future relations.[131] Nevertheless, Bush asked Congress for $5.4b for SDI in fiscal year 1993 budget request, a 31% increase from the previous year's authorisation, and the most ever requested for the programme in its eight-year history.[132] The president maintained that despite recent developments, the system was necessary to

[129] Tom Wicker, "Why another ABM", *New York Times*, (24th November 1991)
[130] North Dakota was chosen as the site for the single US BMD system under the ABM Treaty because it was designed to defend ICBM silos, and not the US population. Thus, the legislation would involve changing the purpose of the site from "point defence" to "population defence", which because of its location would not be possible. For more on this see David Smith, "The missile defense act of 1991", *Comparative Strategy*, 12:1 (1993), pp71-73: 71
[131] Goldgeier & McFaul (2003) 21-6 & 52-3
[132] James Asker, "ABM enthusiasm wanes in Congress", *Aviation Week & Space Technology*, (16th March 1992)

"confront successfully the growing dangers of instability and missile proliferation".[133] Of even greater significance, the SDIO seemed to be carrying on with GPALS development virtually irrespective of the constraints outlined in the Missile Defense Act, and the unpopular and contentious Brilliant Pebbles remained the centrepiece of this architecture. When SDIO Director Henry Cooper testified to the Senate Armed Services Subcommittee on Strategic Forces on 9th April 1992, his outline of GPALS and SDI caused so much concern that Chairman Sam Nunn (D-GA) ordered a Government Accountability Office (GAO) study to be conducted into the programme.[134]

Bush's plans were however given new life by overtures from Boris Yeltsin that Russia might be willing to revive the idea previously floated by Mikhail Gorbachev of pursuing some type of joint BMD effort.[135] Yeltsin proposed the creation of a "global system of protection" that would be based on a "revised US SDI system and advanced technologies being developed by the Russian military industrial complex".[136] Although the specifics of what the global protection system might actually contain remained undefined and vague, the idea of future BMD cooperation was welcomed by the Bush administration.[137] The main attraction for Bush was almost certainly that cooperation might include a new agreement for an amended ABM Treaty that would allow him to pursue GPALS in the manner preferred by the SDIO, without having to endure either domestic or international political opposition. It might also pave the way for greater reductions in the Russian nuclear stockpile.[138]

However, enthusiasm for BMD, and even the possibility of some type of BMD cooperation, was dashed by a succession of damaging reports into the technological underpinnings of various systems being developed by the SDIO during February 1992. The first, a report by the GAO into Bush's proposed GPALS programme, found that the SDIO had "failed to develop a stable

[133] George HW Bush, *"Statement of the Strategic Defense Initiative",* (23rd March 1992)
[134] Baucom (2004) 174; Fitzgerald (2001) 488-9
[135] Graham (2003) 21
[136] Burns & Brune (2003) 149-50
[137] Graham (2003) 21-2
[138] Denoon (1995) 138-9

architecture" with which to proceed with the system.[139] The report also questioned the reliance upon Brilliant Pebbles, suggesting that the concept had still not been proven to work, that it was not at all clear that the Pebbles could be built or work as described, and that Bush's plan would continue to face "tremendous challenges".[140] A few weeks later, top Pentagon scientist Aldric Saucier claimed that the SDIO had consistently and deliberately misled Congress on the technical achievements, potential costs and programme scheduling of Brilliant Pebbles in order to make the scheme seem more appealing.[141] To compound problems, the ERIS interceptor failed its second development test in early March.[142]

This newfound uncertainly was reflected in Congress by Representative John Conyers (D-MI) as he released his own report into Patriot and GPALS just prior to the House debating Bush's 1992 defence budget request. Conyers suggested that

> Over the past eight years, the administration had been successful in conning Congress to give it billions of dollars for Star Wars, but the program has proved remarkably unsuccessful in providing much of anything with the funds.[143]

On 2nd June 1992, Pentagon Program Analyst Dr Daniel Chu recommended that the ERIS interceptor not be built until it was more thoroughly tested, stating that he didn't think that the system could or should be deployed before 2002 at the earliest. In order to meet to 1996 deadline set by the Missile Defense Act, he said, ERIS would have to be exempted from dozens of important tests and laws.[144] Chu's report caused the SDIO to announce that it would be delaying construction of GPALS, and that the earliest deployment date would now be put back to 1998 to allow for more testing and development of the system.[145] The credibility of GPALS had been further damaged by a

[139] "Strategic Defense Initiative: estimates of Brilliant Pebbles effectiveness are based on many unproven assumptions", *US General Accounting Office,* (March 1992)
[140] Ibid
[141] Asker (16th March 1992)
[142] Matthew Bunn, "Star wars program under increasing attack", *Arms Control Today,* (April 1992)
[143] Quoted in Burns & Brune (2003) 143
[144] Ibid 147
[145] Matthew Bunn, "Pentagon critique delays Star Wars deployment", *Arms Control Today,* (June 1992)

report from the Congressional Budget Office (CBO), which recommend eliminating all funding for Brilliant Pebbles in May 1992.[146]

When the House Armed Services Committee met in May 1992, it recommended that funding for Brilliant Pebbles be cut entirely as part of Les Aspin's (D-WI) plans for the House to cut around $90b from the defence budget over the next five years.[147] When it was voted for by the whole House in June, $4.3b was allocated to the SDIO, and although Brilliant Pebbles would still receive some funds, it was not the "robust funding" that the SDIO and Bush had hoped for.[148] The Bill also stipulated that 1996 was no longer the target date for deployment, and that compliance with the ABM Treaty was a primary goal of US strategic policy.[149] As such, the bipartisan BMD consensus embodied in the Missile Defense Act, the strategic necessity of deployment, as well as any apparent drive from technology appeared to have eroded by mid 1992.

While this was going on, Bush remained focused on pushing for nuclear arms reductions and more secure relations with Moscow during 1992. The president was keen to see whether some type of agreement on BMD cooperation might allow changes to be made to the ABM Treaty to allow for GPALS, without disrupting other ongoing strategic arms reduction talks. Bush was also interested in the possibility of BMD cooperation, and agreed with Yeltsin at a summit meeting in Washington during June to "work together with allies and other interested states to develop a concept for global protection systems against limited ballistic missile attack".[150] It was also agreed that a high-level BMD cooperation working-group under the stewardship of Soviet specialist Dennis Ross and Russian Deputy Foreign minister Georgi Mamedov would be established to examine the

[146] "Costs of alternative approaches to SDI", *Congressional Budget Office*, (May 1992)
[147] *Arms Control Today* (April 1992)
[148] Bush remained wedded to the notion in part because of the fierce lobbying of SDIO Director Henry Cooper. According to Donald Baucom, "… a fainthearted SDI program manager might have severely restricted the Brilliant Pebbles program. Henry Cooper was anything but faint-hearted. And under his tutelage, SDIO continued to push Brilliant Pebbles because of its primary role in GPALS, thereby setting himself and his agency on a collision course with Congressional Democrats, many of whom were committed to arms control and staunch opponents of SDI". (2004) 173-4
[149] Lockwood (June 1992); *The Washington Times* (17th March 1992)
[150] George HW Bush, *"Remarks with President Boris Yeltsin of Russia, announcing strategic arms reductions in an exchange with reporters",* (16th June 1992)

possibilities of a variety of different practical applications of this idea.[151] The working group would seek to examine issues to do with the sharing of early-warning data and the possibilities of cooperating on the development of BMD technologies, but most importantly for Bush, the group would also begin discussing and exploring the possibilities of constructing a legal basis for the initiative, and whether the ABM Treaty could be amended, or even discarded in favour of a new agreement.[152]

However, both parties had very different ideas over what the concept of a "global protection system" actually meant, and more importantly, what they hoped to gain from it. Bush had instructed the US officials present at the discussion that their primary aim was to try to push Yeltsin to agree to radically alter the ABM Treaty; actual BMD cooperation, which Bush thought was unlikely given the gaps in relative technologies, was very much a secondary concern.[153] Secretary of Defense Dick Cheney outlined the goals of US negotiators in a statement to the Senate Foreign Relations Committee in late June 1992:

> [Our primary aim is] changes that would permit deployment of [US] ABM interceptors at multiple sites, deployment of a full range of sensors, freedom to develop and test all ABM systems and components, and loosened restraints on tactical defenses.[154]

The US negotiating stance was underpinned by a hope that pursuing the cooperation agenda with Moscow, and perhaps acquiring ABM Treaty amendments, could help change public and Congressional perceptions of BMD in the US without relying on Congress. As Stephen Hadley, the then Assistant Secretary of Defense for International Security Policy, later suggested, "if we could get the Russian's to agree on BMD then even Sam Nunn and Carl Levin couldn't oppose it."[155] However, Russian officials continued to link BMD cooperation with a joint commitment to the sanctity of the ABM Treaty, and although discussions would continue into October, nothing was

[151] George HW Bush, *"Joint United States-Russian statement on a Global Protection System",* (17th June 1992)
[152] Ibid
[153] Stephen Hadley, "Global Protection System: concept and progress", *Comparative Strategy,* 12:1 (1993), pp2-6: 5
[154] Quoted in Hadley (1993) 6
[155] Interview with Stephen Hadley (26th June 2010)

ever specifically agreed during these consultations, and Bush remained hamstrung in his BMD efforts by the ABM Treaty and the growing domestic opposition to GPALS.[156]

Before the defence budget was debated in Congressional conference, more reports emerged questioning the technology and development programmes at the SDIO. Firstly, in September 1992 the GAO published two more in a long line of damning reports into various aspects of the SDI. In the first, which had been mandated by John Conyers (D-MI), the GAO fundamentally undermined those who maintained that Patriot had performed successfully during the Gulf War by claiming that:

> The Army did not collect performance data during Operation Desert Storm that would permit an absolute determination of how many of its targets the Patriot killed or failed to kill.[157]

The report went on to say that the "strongest evidence that an engagement resulted in a warhead kill" supported only about 9% of the Patriot's engagements, while such evidence did not support the other 16% claimed by the Army at all.[158] The second GAO report further eroded domestic support for BMD by suggesting that of the seven tests of the ERIS interceptor that had taken place between January 1990 and March 1992, four results had been exaggerated and the other three were either complete failures or only partially successful. What is more, it pointed out that no Brilliant Pebbles test had yet been successful.[159] The administration and the prospects for SDI were not helped by another failed ERIS test on 22nd October.[160]

After conference in October 1992, Congress voted to appropriate $3.8b for SDI for fiscal year 1993, over $1.5b less than the Bush administration had asked for, and nearly $300m less than had been authorised.[161] Although Bush and Cheney both threatened a veto if SDI was "not adequately funded" they made no real effort to see their threats through, realising that sufficient

[156] Bunn (June 1992); Hadley (1993) 5-6
[157] "Operation Desert Storm: data does not exist to conclusively say how well Patriot performed", *US General Accounting Office*, (22nd September 1992)
[158] Ibid
[159] Burns & Brune (2003) 147-8
[160] Baucom (2004) 180
[161] "$253.8bn defense appropriations holds SDI to $3.8bn", *Aerospace Daily* (6th October 1992)

domestic support for the programme simply did not exist, and deciding instead to focus their energies and attentions on other policy issues.[162] As part of the defence budget, Congress cut funding for space-based research and development projects, included official language that made it clear that no BMD system should come into conflict with the ABM Treaty, and removed any pretence at a 1996 deployment date.[163] Nevertheless, in mid-January Henry Cooper outlined his projected budget for the SDIO for the next five years, which envisaged spending $51b through fiscal year 1999, including vast sums on Brilliant Pebbles, which would include a $7b request for SDI in fiscal year 1994.[164]

(3) Assessing the drivers of policy, 1989-1993

Changes in the international system and the lack of credible technology explain the general loss of enthusiasm for missile defence during Bush's presidency, and indeed some of the policy decisions that he made. However, the particular rhythms of the debate between 1989 and 1993, along with many decisions crucial to the shape and components contained in the US BMD effort, can only be explained by looking at the interaction of competing domestic dynamics within this overarching context.

International and technological factors

The tumultuous changes in the international system between 1989 and 1993 go along way to explaining the gradual demise of the missile defence programme under George H. W. Bush. The end of the Cold War and its replacement with an international environment where the US appeared to face no obvious threat meant that the SDI programme lost much of its strategic necessity. In

[162] "Wallop says Bush's low profile in budget debate hurt SDI", *Aerospace Daily* (24th September 1992)
[163] Baucom (2004)
[164] "Cooper releases SDIO budget plan through FY99", *Aerospace Daily* (12th January 1993)

addition to this, the demonstration of the threat from battlefield missile attack during the Gulf War was an equally important factor in establishing a bipartisan consensus for the need to develop and deploy battlefield missile defences to protect troops overseas. The Gulf War was also a key reason for the surge in support for missile defence during 1991 that resulted in the Missile Defense Act. As a result, policy broadly reflected the changing international system during this period.

Nevertheless, these systemic changes do not explain why Bush outlined a BMD plan that continued to prioritise a comprehensive defence against a large-scale attack, consisting of hundreds of ground and space-based assets, despite the collapse of the Soviet Union. Neither does it explain why Bush pursued a system that would contravene the ABM Treaty and thus make further arms reductions with Russia and the safe transition of the Soviet Union, more complicated. Moreover, systemic pressures do not explain why Bush and Congress remained wedded to very different conceptions of missile defence. Perhaps above all, it does not explain why Bush's BMD plans appeared to pay relatively little attention to the new threat to US troops on the battlefield from the proliferation of short-range missile technology demonstrated by the Gulf War. Lastly, the changes in the international system do not explain why sufficient accord existed in 1991 for the establishment of the Missile Defense Act and a scaled down version of GPALS, but which had then disintegrated less than a year later.

Some of these questions can be answered by looking at developments in technology during this period. In particular, the desire on the part of the Bush administration to deploy a comprehensive missile defence system was undoubtedly driven by the promise and possibilities offered by Brilliant Pebbles. Secondly, the initial reports about Patriot's success in the Gulf War in early 1991 were a driving force behind the Congressional "basis for consensus" plan and the 1991 Missile Defense Act. In addition to this, continued test failures of components key to GPALS, and reports that Patriot's performance was overstated, were central reasons why support for missile defence gradually fell away towards the end of this period.

All the same, this still doesn't explain why Bush continued to favour technologies that had not been proven to work, or that were destined to contravene the ABM Treaty. Neither does it clarify why both Bush and Congress continued to have such different and competing notions of what type of technologies should and could be deployed. Finally, it can say little about why both Bush and Congress (in 1991) were keen to push for early deployment of a system that was far from technologically viable. At best, the overall performance of technology during Bush's presidency suggests that the US should have continued a research and development programme, and worst it implies that any type of credible deployment remained years, if not decades away. Consequently, neither developments in the international system, nor the particular capabilities of technology can fully explain what happened between 1989 and 1993.

Domestic factors

A fuller understanding of why policy evolved in the way it did during this period can only be gained from an examination of the domestic realm, and in particular of the actions and thinking of the president and Congress. While the BMD debate evolved within the larger strategic context set by the international system and technology during this period, the specific rhythms of policy were essentially shaped by the different ideas and conceptions of missile defence held by Bush and Congress. It would be the interplay between these actors, exacerbated by the partisan imbalance between the institutions, that would cause policy to fluctuate within the fluid boundaries set by technology and the international system.

The actions and thinking of George H. W. Bush were central to the evolution of policy during this period. Bush's BMD thinking, which in turn was shaped by SDIO Director Henry Cooper, largely explains why the US continued to pursue a missile defence plan that appeared at odds with both the developments in the international system and the current capabilities of

technology.[165] Primarily, Bush's BMD plans were a reflection of his cautious and pragmatic approach to policy. First, because Bush wanted to ensure continued support from the right of the Republican Party and from those who had been loyal to Ronald Reagan, the president felt obliged to pursue a BMD policy not-too-far removed from that of his predecessor, and based upon the Strategic Defense Initiative. This involved retaining complex technologies such as Brilliant Pebbles, and adopting a BMD deployment plan that was likely to contravene the ABM Treaty. Second, because Bush wanted to retain a hedge against an uncertain future, he saw a comprehensive missile defence plan as the best way to do this. Again, this meant the deployment of a wide-ranging system likely to breach the ABM Treaty. Moreover, the result of hedging against future developments naturally meant that GPALS was out of sync with the types of threats the US looked likely to face at the dawn of a new era. Third, although Bush was not against the idea of deploying missile defences, the programme was never a priority for his administration, and never surpassed other policy concerns, particularly strategic arms reduction agreements with Moscow, which in turn were based on limiting BMD. The result was a policy that reflected a balance of political objectives rather than a strategic programme in its own right, and this is partly why Bush's thinking often appeared at odds with the international context and technological capabilities.

In spite of this, to understand why Bush was unable to achieve his desired aims – for Bush was certainly not anti-missile defence – explanations must take into account the importance of Democratic control of both the House and Senate throughout this period. Quite simply, the partisan institutional divide meant that between 1989 and 1993, excluding 1991, Democratic control of Congress ensured that Bush's BMD plans, especially anything that looked set to violate the ABM Treaty, were subject to very high levels of scrutiny, particularly in the House of Representatives. Part of the reason for this may have been that Bush continued to push for funding to please the right of the Republican Party in the confidence that Congress would block it, and that it would therefore

[165] According to the then Director of Strategic Defense Policy Stephen Cambone and future Missile Defense Agency Historian Donald Baucom, a key reason why Brilliant Pebbles remained so central to the SDI and GPALS concept was because of the tireless efforts of SDIO Director Henry Cooper – without this pressure Bush may well have opted for a less comprehensive and contentious system. Interview with Stephen Cambone (5th August 2010); Baucom (2004) 164-184

not undermine his wider agenda with Russia. In this sense, the programme could be seen to move ahead incrementally for primarily *domestic political reasons* during this period.

The impact of Congress on the evolution of policy during Bush's presidency is perhaps nowhere better highlighted than by the developments of 1991. The Persian Gulf War was a key moment in the development of BMD thinking during this period for two main reasons. First, it highlighted the growth of a new threat from short-range missiles and WMD proliferation. Second, the Patriot BMD system appeared to show how missile defences could work under real world conditions. However, Bush and Congress interpreted the meaning of these events very differently – primarily because of their contradictory predispositions towards BMD – and this led to the development of two different conceptions of what type of system the US should be pursuing. Congress agreed upon a smaller-scale deployment plan compliant with the ABM Treaty, while the president continued to push for the comprehensive GPALS system. This variance in opinion on how to move forward with BMD resulted in two different policies, and would become manifest in the unstable Missile Defense Act. As a result, the Missile Defense Act itself – which reflected neither Bush's plans, the international system or indeed current technological capabilities – was an explicit demonstration of the importance of *domestic political factors* in the evolution of the BMD debate during this period.

Summary

While changes in the international system and the capabilities of technology can explain the general trend of policy during this period, the evolution of the US missile defence programme was primarily shaped by domestic dynamics. It is only through the different conceptions and understandings of missile defence held by Bush and a Democratically controlled Congress, and their attempts to use the programme for *domestic political reasons*, that an understanding of the particular rhythms of policy during the period can be obtained. It was the conflicting pressures

forcing Bush to maintain a comprehensive BMD system, pitted against a legislature keen to scrutinise any BMD plan and ensure that it remained legal under the ABM Treaty, which led to the particular dynamics of this period. In the words of Major Garrett:

> Without a Republican majority in Congress – and because it did not take a strong stand on such fundamental issues as the ABM Treaty – the Bush Administration was hamstrung in its effort to push for a strong ballistic missile defense.[166]

Conclusion

During George H. W. Bush's presidency, US ballistic missile defence thinking and policy changed substantially. In some regards, these changes reflected the transformation in the international system, and in the type of threat that the US was likely to face. To a lesser extent, it also reflected the limitations of technologies designed to defend against large-scale missile attack. Nevertheless, neither systemic nor technological pressures can explain the particular evolution and shape of the programme during this period. This is because a president and Congress with different ideas about the role that the programme should play in US security strategy, and with markedly different reasons for doing this, were the key factors shaping the US approach BMD.

The BMD debate evolved in the manner in which it did because of the thinking and actions of the Bush Administration and a Democratic controlled Congress. Bush's cautious nature, focus on arms cuts with the Soviet Union, and need to placate BMD advocates within his party, were a key reason why the administration continued to favour a comprehensive BMD system, but without necessarily giving it sufficient political backing. This in turn meant that a Democratic controlled Congress, neither convinced of the wisdom, necessity or practicality of such an undertaking, would make substantial cuts to funding in 1989 and 1990. Much the same was true in 1991, when Bush continued to push for a missile defence system unacceptable to Congress, despite lawmakers warming towards the idea of BMD in the aftermath of the Gulf War. The compromise contained at

[166] Garrett (2005) 200

the heart of the Missile Defense Act of that year was a direct reflection of these competing domestic pressures, and of a perceived necessity on the part of Democrats not to look weak on defence. Lastly, in 1992, Bush simply wasn't prepared to jeopardise post-Soviet stability in Russia and the prospects of further arms cuts by pushing Moscow on the issue of BMD. Consequently, Congress would impose further limitations and budget cuts on the programme during Bush's final year in office. The result was that although Bush wanted to be "for" missile defence, he never provided the backing that the programme required to survive in the political context within which he was acting.

As George H. W. Bush left office in January 1993, the US ballistic missile defence programme, particularly the Strategic Defense Initiative, appeared to be at a crossroads. The tumultuous changes in the international system and the transformation of the position of the US within it had much to do with this. The collapse of the Soviet Union and the rise of US "unipolarity" meant that the missile threat had receded substantially, while even the growing awareness of a new threat from short-range missiles was only in its early stages. In addition to this, most of the technologies required for even rudimentary battlefield defences, let alone nationwide systems, appeared far from ready to be deployed. As a result, regardless of who won the 1992 presidential election, the future of any US missile defence effort beyond relatively minimal battlefield defences appeared uncertain, but still alive.

Bill Clinton and the End of the Star Wars era, (1993-1997)

Bill Clinton took office in January 1993 determined to reduce the defence budget, concentrate on domestic priorities, and recalibrate US defence policy to a newly emerging, and what he perceived to be a less threatening world order. The new president was also known to view the ABM Treaty as integral to US-Russian nuclear arms cuts, as a key means to reinforce the Nuclear Non-Proliferation Treaty, and as a central plank of international stability. With Democrats still in control of Congress, the Cold War standoff with Russia now just a memory, and with the United States emerging as the world's preeminent power, there appeared little need to pursue extensive BMD programmes. As a result, it was assumed that Clinton would reduce spending on ballistic missile defence and put an end to the Strategic Defense Initiative.

The evolution of US ballistic missile defence policy between 1993 and 1996 provides a fascinating example of how a president's initial plans can change. In early 1993, in line with his pre-election pledges, Clinton announced his determination to completely reorient the Strategic Defense Initiative and replace it with a plan that would emphasise theatre and battlefield missile defences, and research on systems that would not contravene the ABM Treaty. In 1994 and 1995 Clinton went even further, by explicitly reiterating his administration's commitment to the ABM Treaty as the basis of relations with Russia, and making it clear that he did not intend to pursue any BMD policies that might undermine relations with Moscow. However, despite this, in 1996 Clinton announced that the US would be embarking upon a national missile defence development and deployment plan. What makes this change in the debate particularly interesting is that, unlike during the Bush administration, very little had actually changed in the international system between 1993 and 1996: no immediate new threat had emerged, Russia was subdued, and China was only just beginning its drive to modernity. Neither did there appear to be any great push from technology. Despite this, Clinton's initial BMD policy agenda would be almost entirely reversed

by 1996, which meant that missile defence would become an even greater part of his policy agenda during his second term in office.

This period produces several interesting questions. First, why did Clinton unveil a national missile defence deployment plan in 1996, despite attempting to "kill" the programme in 1993, and focus on battlefield and theatre defences? Second, why did Clinton's 3+3 plan appear to reflect neither international systemic developments nor current levels of technology? Third, why did Clinton's BMD plans evolve in such a manner that they essentially appeared to undermine his wider foreign and domestic agendas? In order to understand these questions it is necessary to look at the interplay between domestic, international and technological influences, and at how these combined to produce the complicated policy outcomes described above.

(1) Competing pressures on BMD policy

With the collapse of the Cold War confrontation with the Soviet Union, and the considerable reduction in the threat of missile attack that this produced, Bill Clinton assumed the presidency at a time when most Americans felt more secure than they had done for several generations. In addition to this, Clinton entered office at a time when almost all faith in the viability of the Strategic Defense Initiative had disappeared, and very little in terms of missile defence technology looked close to being able to be deployed. Finally, at least for the first two years of Clinton's presidency, Democrats remained in control of Congress, and continued to be sceptical of pursuing anything other than battlefield defences. All of these factors suggested that Clinton would have little difficulty in redirecting and recalibrating the US BMD programme to what he perceived to be a less threatening international environment.

International pressures on policymaking

In 1993, the US appeared to be standing at the edge of a new era in international politics; the Soviet Union had collapsed leaving the United States as the world's pre-eminent power, and any new ballistic missile threat appeared to be many years into the future, if at all. The only real concern in Washington that might warrant some type of BMD effort was the growing proliferation of short-range missile technology in unstable regions throughout the world, but this too remained limited. In fact, the international system changed very little during Clinton's first four years in office, particularly the ballistic missile threat to the US, which meant that as he campaigned for re-election in 1996, international systemic pressures on policy – notwithstanding the relationship with Russia and the ABM Treaty – remained relatively benign.

The primary international pressure on policymaking during this period remained the US relationship with Russia. Although the Soviet Union had collapsed, and the two powers were ostensibly no longer enemies, this dynamic remained of paramount importance to BMD policy. The centrepiece of this relationship, especially for Russia, was the continued centrality of the Anti-Ballistic Missile Treaty as the cornerstone of the new post-Cold War US-Russia relationship.[1] The fact that Moscow made it clear that that the Treaty was the basis upon which any new arms reduction agreements would have to be based, further cemented its importance to Clinton's strategy. With growing concerns in Washington about the stability of the Russian government, securing the enormous ex-Soviet nuclear and weapons stockpile also looked set to be a high priority during this period.[2]

The second important international dynamic influencing policy was the fact that after the 1991 Gulf War there appeared to be no new and near-term missile threat to the United States.

[1] Mark Clark, "The Clinton legacy on ballistic missile defense", *Comparative Strategy*, 19, (2000) pp201-219: 201-2. According to Clark, "The Clinton administration came to office with a great deal of intellectual baggage about the Cold War … [in particular] although the Soviet Union had collapsed, Clinton viewed America's relationship with Russia as strategically vital … the cornerstone of that relationship was the 1972 Anti-Ballistic Missile Treaty".
[2] David Auerswald, "The president, the Congress and American missile Defense policy", *Defence Studies*, 1:2 (2001), pp57-82: 67. According to Auerswald, "defusing the known Russian missile threat took precedence over defense against a possible rogue state attack".

While concern was certainly growing that "rogue states" such as North Korea and Iraq may be pursuing WMD programmes, a new credible threat from this source – particularly to the US homeland – was thought to be many years away. As a 1993 National Intelligence Estimate into the ballistic missile threat to the United States suggested: "only China and the CIS strategic forces currently have the capability to strike the continental US", and that; "Available information shows the probability is low that any other country will acquire this capability during the next 15 years".[3] Nevertheless, the bipartisan consensus about the need to protect troops in the battlefield from the growing threat of short-range missiles continued to gain traction during this period as more states in unstable regions across the globe appeared set on acquiring this capability.[4]

Internationally therefore this period is characterised by an overwhelming sense of security – particularly from ballistic missile attack – and the emergence of what appeared to be a more peaceful and stable international order. Although the proliferation of short-range missile technology remained a concern, especially on the Korean peninsular, any new serious and credible threat to the US homeland seemed to be many years away. As a result, throughout this period, most Americans rated the threat from ballistic missile attack as one of their lowest national security concerns.[5]

Technological pressures on policymaking

In early 1993, it looked like the Strategic Defense Initiative – even George H. W. Bush's scaled down GPALS plan – had run its course. Very few of the technologies that had been developed over the past decade had shown any possibility of near term deployment, and even the Patriot BMD system remained many years away from providing a credible defence against short-range missile

[3] NIE93-17, *"Prospects for the worldwide development of ballistic missile threats to the continental United States",* (17th November 1993)
[4] Confidential interview (D)
[5] James Kitfield, "America's not listening", *The National Journal*, (13th July 1996)

attack. To put it simply, there was very little push from technology to suggest that anything could or should be deployed during this period.[6]

However, this is not to suggest that technology just stood still. In many ways, this period saw the genesis of a number of new programmes with different capabilities, designed to counter the wide gamut of short-range and battlefield ballistic missile threats that planners believed the US might face in the future. Although work would continue on a newer version of the ERIS ground-based interceptor – designed to protect the US against long-range threats – the majority of time and funding would go into developing a new range of theatre and battlefield missile defence systems. Specifically, the US began to develop the Patriot system into a fully-fledged missile rather than air defence system, and introduced a range of programmes designed to combat short and regional missile threats. These included the Terminal High Altitude Area Defence (THAAD), the Medium Extended Air Defence (MEADS), the Navy's Standard Missile (SM) 3, and Upper and Lower Tier sea-based-BMD systems.[7] Nevertheless, between 1993 and 1997, these systems predominantly remained in the research and development stage. Actual testing of the THAAD system for example, was not scheduled to begin until the end of the decade. As a result, and while the US continued to develop a range of BMD technologies, nothing – even Patriot – was near to being seriously considered for deployment during this period.[8]

The last vestiges of the Strategic Defense Initiative disappeared between 1993 and 1997, and were replaced by a range of new and theoretically less technologically complex BMD research and development programmes intended for battlefield rather than national defence. This change in focus was driven in part by the complexities associated with constructing a national missile defence system, but this did not mean that any of these new battlefield programmes represented an easy

[6] For more on the status on the US BMD programme in 1993 see "Ballistic missile defense: evolution and current issues", *US General Accounting Office,* (July 1993)
[7] For more on the systems being developed between 1993 and 1996, see "Statement of Lieutenant General Malcolm R. O'Neill, USA, Ballistic Missile Defense Organization", before the Committee on National Security, House of Representatives, (4th April 1995)
[8] Ibid

solution. In fact, during this period the US really had "nothing that looked likely to be deployable in the near future other than Patriot".[9]

Presidential policy agenda

Bill Clinton had been clear about his views on missile defence during the 1992 presidential election campaign, and it was widely accepted that the programme would not be a top priority for his administration should he defeat the incumbent George H. W. Bush.[10] Clinton was keen to reap the rewards of what he perceived to be a new and more peaceful era in US foreign relations, and this would involve a refocusing of US resources away from defence. The president and many of those around him also appeared eager to reorient the US BMD programme to reflect the different pressures of what they perceived to be a more peaceful and stable international environment. As a result, Clinton looked unlikely to continue the missile defence policies he had inherited from Bush.

The first dynamic that would shape Clinton's BMD strategy during his first term was his desire to make significant reductions in the US defence budget and to concentrate his time and energy on domestic issues. Clinton had made it clear in 1992 that he was determined to redirect the "resources once dedicated to winning the Cold War towards fulfilling unmet domestic needs", declaring that "now that the Cold War is won, we cannot leave those who won that victory out in the Cold".[11] Even in terms of foreign policy, Clinton seemed to believe that funding should be reallocated towards non-proliferation programmes and less "militaristic" approaches to international affairs, and envisaged cutting BMD funding to around $3-4b per year rather than the £7-8b proposed by the outgoing Bush administration.[12]

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[9] Confidential interview (B)
[10] See "The Democrats and arms control: the questions in 1992", *Arms Control Today*, (March 1992) 3-6. In fact, Clinton also said that his Administration would seek to bring "a healthy dose of reality to the SDI program, a quality that it sorely lacks today".
[11] Bill Clinton & Al Gore, *"Putting people first: how we can all change America",* (New York, Times Books: 1992) 75-6
[12] Dunbar Lockwood, "Clinton provides outline of defense spending cuts", *Arms Control Today*, (March 1993)

The second factor underpinning Clinton's thinking was his determination to secure a stable relationship with Russia.[13] Foremost amongst this was the president's desire to successfully ratify the START II Treaty, which he believed could be facilitated by maintaining the US commitment to the ABM Treaty.[14] In addition to this, Clinton hoped to use progress in relations with Moscow to move forward on the Comprehensive Test Ban Treaty (CTBT) and to reinforce the Nuclear Non-Proliferation Treaty (NPT). Both of these aims, he believed, were fundamentally contingent upon stable relations with Russia and continued adherence to the ABM Treaty.[15] According to John Holum, the then Director of the US Arms Control and Disarmament Agency, Clinton was determined to ensure that US BMD plans remained compliant with the Treaty, and therefore that missile defence did not complicate his primary goal of arms reductions and stability with a transitional Russia.[16]

Finally, Clinton's thinking was influenced by his understanding of the type of threats that the US seemed likely to face in the post-Cold War world. Above all, the administration's policy was shaped by the fact that Clinton and many of those around him – but particularly his first Secretary of Defense Les Aspin (January 1993- February 1994) – believed that any new ballistic missile threat to the US homeland from any source, but particularly from rogue states, remained many years away.[17] There was also a feeling within the administration that future threats to US security would not necessarily be from ballistic missile attack.[18] Nevertheless, Clinton had been strongly influenced by the Gulf War, and was determined to recalibrate the missile defence programme to what he believed were the most pressing requirements, namely theatre and battlefield missile defences to counter short range and regional missile threats. In fact, Clinton made this clear

[13] According to David Tanks, Clinton believed that "the greatest threat to US security was the huge stockpiles of residual Cold War nuclear weapons, [therefore] the focus of US nuclear policy should be to reduce the nuclear inventories of both Russia and the US". David Tanks, *"National Missile Defense: Policy Issues and Technological Capabilities",* (Washington DC, The Institute for Foreign Policy Analysis: 2000) 21
[14] Clinton & Gore (1992) 42-43
[15] Goldgeier & McFaul (2003) 291. The new team believed strongly in traditional arms control regimes and believed if "the Russians were confident that strategic defenses were not being pursued, then the administration could achieve further reductions in offensive weapons and gain Russian support for the CTBT and NPT".
[16] Interview with John Holum (27th July 2010)
[17] Confidential interview (E)
[18] Ibid

shortly before entering office by declaring that the SDI programme should "be geared towards the real threats that we face today and are likely to face in the future, not the fevered rationalizations of a weapons program in search of a mission".[19] Nevertheless, Aspin's replacement, Secretary of Defense William Perry, along with other members of the administration such as Undersecretary of Defense for Policy Walter Slocombe and Special Assistant for National Security Affairs Bob Bell, believed that if the US could build something against the rogue threat it was worth doing.[20]

Clinton, along with some of his close advisers, was not against the idea of developing missile defences, and it was certainly his intention to push ahead with a range of tactical missile defence systems to protect troops on the battlefield, and even develop some capability for national defence should it be required in the future. But at the same time, he remained staunchly committed to the logic of Mutual Assured Destruction and the ABM Treaty as the cornerstones of international security.[21] As a result, Clinton set out to recalibrate, reorganise and downgrade the SDI programme and to make sure that it did not get in the way of his wider policy agenda.

Congressional pressure on policymaking

Attitudes towards ballistic missile defence remained split along party lines within Congress between 1993 and 1997, with both parties largely sticking to the positions and thinking that had developed during the 1980s and under George H. W. Bush. A large number of Republican lawmakers remained committed to the goals of the Strategic Defense Initiative, or at least to the notion of deploying ballistic missile defences as soon as possible, while most Democrats remained cautious and sceptical of the need for such grandiose schemes, but at the same time not against continued work on battlefield missile defences.[22] As a result, the composition and dominant party

[19] Bill Clinton & Paul Tsongas, "The Democrats and arms control: the questions in 1992", *Arms Control Today* (March 1992)
[20] Interview with Walt Slocombe (3rd August 2010); Interview with Robert Bell (6th March 2010)
[21] Ibid
[22] Bradley Graham, "Republicans plot military manoeuvres: draft legislation revives Star Wars, increases spending, creates panel", *The Washington Post*, (12th December 1994)

in Congress would again shape the amount and type of pressure that lawmakers would bring to bear on policy during this period.

For the first two years of Clinton's presidency the Democrats remained in control of both Houses of Congress, which meant that there was very little push for BMD, or indeed resistance to the president's plans to cut the programme back and restructure it. In fact, much of the enthusiasm for even a limited missile defence system had melted away within the Democratic party by 1993, as lawmakers saw very little need for such a system in the post-Cold War and post-Gulf War world. Democrats simply could not see any reason why the US needed to pursue any type of large-scale BMD programme, and continued to view the ABM Treaty as the cornerstone not just of the new relationship with Russia, but also as the basis for stability in a new and changed global environment.[23] Even Republican lawmakers seemed far less enthusiastic about BMD than they had been under Reagan and Bush, leaving only a few Congressmen and a small group BMD advocates in right-leaning think tanks in Washington DC, publicly pushing for a larger missile defence effort in 1993.[24] The result was that during 1993 and 1994 Congress largely went along with the funding cuts and recalibration of the US missile defence effort instigated by Clinton.

This all changed in late 1994 as the Republican Party won control of both Houses of Congress for the first time in a generation, and set about implementing their Contract with America.[25] Although the Contract consisted primarily of domestic legislation – reflecting the conservative nature of the new Republican leadership – it also included a commitment to deploy a national missile defence system as soon as possible.[26] Consequently, Republicans in Congress – led by Newt Gingrich (R-GA) – began to exert far more pressure on policy, and pushed for more funding for BMD and a legally binding commitment to deploy both national and theatre missile defence systems at the earliest possible date. Republican leaders called for a "cost effective,

[23] Confidential interview (B)
[24] Confidential interview (E)
[25] See Newt Gingrich, *"Contract with America: the bold plan by Rep. Newt Gingrich, Rep. Dick Armey, and the House Republicans to change the nation",* (New York, Times Books: 1995)
[26] Ibid

operational antiballistic missile defense system as early as possible", and declared the ABM Treaty to be "a Cold War relic that does not meet the future defense requirements of the United States."[27] Although not all Republicans were behind this push – fiscal Republicans concerned about the cost of such a move remained highly sceptical, and Democrats continued their opposition to such plans in general – Congress, in alliance with think tanks such as the Heritage Foundation and Center for Security Policy, would exert considerable pressure and influence on policy during 1995 and 1996.[28]

Congressional pressure on policymaking during this period was overwhelmingly shaped by two key variables; (1) the split between Republican and Democratic Party lawmakers over BMD policy, and; (2) the change in control of Congress in late 1994. As a result, for the first two years of this period a Democratically controlled Congress exerted relatively little pressure on BMD policy and was content to let the programme be recalibrated and downgraded. However, after the Republican Party took control of Congress following the 1994 mid-term elections, this policy was reversed as the Republicans began to push for higher funding and a commitment to near term deployment. The Republican takeover of Congress therefore represented a significant break in Congressional policy that had remained largely against a large-scale missile defence effort since 1989.[29]

(2) The evolution of policy, 1993-1997

In terms of the international system, the years between 1993 and 1997 were relatively benign. As a result, with the Cold War now safely relegated to history, the American public looked forward to reaping the benefits of a stable and more peaceful world order. With relatively little support for any large scale defence spending – especially on ballistic missile defence – America voted for a president in 1993 promising to put the economy first. In this new era, it appeared that the grandiose

[27] Burns & Brune (2003) 155
[28] Garret (2005) 203-205
[29] In fact, the combination of Democratic control of Congress and scepticism of missile defence can be traced back to the announcement of the Strategic Defense Initiative in March 1983. Interview with Lawrence Kaplan (14th June 2010)

BMD plans of Ronald Reagan and George H. W. Bush would be modified and downgraded to reflect the exigencies of this new international and domestic political context.

1993 and 1994: Restructuring the US missile defence effort

As Bill Clinton took office, he made it clear that his administration was intent on substantially recalibrating and reorganising the US ballistic missile defence effort. In particular, the new president announced that he no longer saw the need to retain a substantial strategic defence programme, and that missile defence resources would be reduced and redirected towards the threats that he believed were "here and now".[30] Subsequently, Clinton would embark on a two-pronged strategy at the start of 1993 that would combine BMD budget cuts and a recalibration of the SDIO domestically, with a different approach to Russia and the ABM Treaty internationally.

The first component of this new approach to missile defence would be a significant alteration of policy domestically, and the Clinton administration made it clear very early in 1993 that the BMD plans outlined by George H. W. Bush would not be continued. In fact, Clinton had clearly made this point in his 1992 campaign booklet:

> We should focus our research and development on the goal of a limited missile defense system with the strict framework of the ABM Treaty. Deployment of a massive space-based defense, such as Brilliant Pebbles, is not necessary.[31]

To this end, the administration initiated a comprehensive review of US national security strategy for the post-Cold War era, known as the "Bottom up Review", which was intended to form the basis of the administration's defence policy for the rest of Clinton's presidency. One of the most notable and immediate impacts of the Review was the recommendation that missile defence funding should be slashed and recalibrated as part of a broader planned reduction in US defence spending. Specifically, the Review recommended that no more than $16.9b in total would be required for

[30] Quoted in Asker (12th April 1993)
[31] Clinton & Gore (1992) 134

missile defence research and development over the next five years, with only $3b needed for strategic and national missile defence programmes.[32] In light of this, Secretary of Defense Les Aspin – who one senior Congressional official described as "looking hard for a post-Cold War peace dividend" as he entered office[33] – made it clear to SDIO Director Henry Cooper that as well as needing to rethink the SDI programme in light of these cuts, the highest priority in development should now be placed on theatre and battlefield missile defence systems.[34] To ensure these new plans were adhered to, Lt. General Malcolm O'Neill would replace Henry Cooper at the SDIO in January 1993.

Perhaps the most symbolic of the changes instigated by the Clinton administration in early 1993 was the decision to replace the SDIO with a new organisation more in tune with the revamped missile defence and national security plans. The new "Ballistic Missile Defense Organization" (BMDO)[35] would not report directly to the Secretary of Defense – as the SDIO had done – and would be organised to reflect the growing short-range and regional missile threat, and not that of a more sophisticated or accidental strike from a major strategic competitor.[36] Secretary of Defense Aspin declared that this decision was necessary because "the fate of Star Wars had been sealed by the end of the Cold War" and because "10 years after SDI had been announced the US has a very different need for ballistic missile defense" and in particular that "Saddam Hussein and the Scud missile showed us that we need BMD for our forces in the field".[37] Consequently, the BMDO would be set up to prioritise the development of theatre and battlefield missile defence systems, and would represent a complete reorientation of the nation's missile defence effort. Under the BMDO, 70% of future funding would go on TMD, 25% on NMD, and 5% on research and development for advanced BMD concepts, meaning that work on strategic missile defence would be downgraded

[32] See Andrew Krepinevich, "Assessing the bottom-up review", *Joint Forces Quarterly,* 3 (1993), pp 22-24
[33] Confidential interview (A)
[34] Asker (15th February 1993)
[35] In fact, the Ballistic Missile Defense Organization was the name given to the agency in charge of the US BMD programme before Ronald Reagan renamed it the SDIO in 1984.
[36] Asker (12th April 1993)
[37] Les Aspin, "The end of the Star Wars era", *Department of Defense News Briefing,* (13th May 1993)

into a basic technology readiness programme.[38] In light of this, the Clinton administration requested $3.8b for BMD in the forthcoming year, including an increase of 60% for tactical and battlefield missile defence programmes, and slashed funding for space-based weapons such as Brilliant Pebbles.[39]

The second half of the Clinton administration's BMD plan would involve a recalibration of policy internationally, more specifically, in the US's approach to Russia and towards the ABM Treaty. Unlike his predecessor, Clinton had no intention of amending or scrapping the ABM Treaty; instead, he strove to make it clear that the Treaty remained the cornerstone of US strategic policy and of US-Russian relations.[40] Clinton firmly believed that his extensive agenda of proposed arms cuts – in particular further strategic arms reductions agreements with Russia – were highly contingent on international stability, and particularly on Russian trust and acquiescence. As a result, soon after taking office Clinton cancelled the Ross-Mamedov talks on ABM Treaty amendments and BMD cooperation that had begun a year earlier, and rejected a Russian proposal to establish a joint BMD early warning centre. In addition to this, Clinton also officially dropped the proposals made by the Bush administration to the Standing Consultative Commission on the ABM Treaty in Geneva for ABM Treaty amendments.[41] In a further concession to Russia, and in another succinct expression of its BMD priorities, the Clinton administration officially repudiated the "broad interpretation" of the 1972 ABM Treaty proposed by Ronald Reagan in 1985, and agreed not to test or deploy any strategic sea-based, air-based, mobile land based or space based missile defence systems and components.[42] In essence, Clinton was more than happy to pay the price of

[38] "Aspin announces end of star wars era; SDIO becomes BMDO", *Aerospace Daily* (14th May 1993); Burns & Brune (2003) 154
[39] Dunbar Lockwood, "Clinton defense budget shows $12bn cut from Bush plan", *Arms Control Today,* (May 1993)
[40] Graham (2003) 24
[41] Dunbar Lockwood, "Administration backs narrow interpretations of ABMT", *Arms Control Today,* (Sept 1993)
[42] Michael Krepon, "Are missile defences MAD?" *Foreign Affairs,* 74:1 (1995), pp19-24: 24

not fully developing his preferred range of TMD systems if it meant securing Russian acquiescence on other priorities.[43]

However, the president was keen to see whether some of his preferred TMD systems could be accommodated under the Treaty, and therefore proposed to switch the focus of the Treaty's Standing Consultative Committee in Geneva from the possibility of BMD cooperation and amendments, to Treaty demarcation.[44] In practical terms, Clinton was keen to discuss whether the Treaty might be clarified to allow for development and deployment of various theatre missile defence systems to cope with the growing threat of short-range missile attack by "rogue states". Although the pursuit of theatre missile defences was not prohibited under the 1972 Treaty, Clinton was determined not to embark upon any BMD development that might be seen to contravene the rather vague wording in the Treaty regarding demarcation between what constituted "strategic" or "non-strategic" BMD systems.[45]

The dual approach of not pushing for "modification" in return for "clarification" of the Treaty, formulated by Special Assistant for National Security Affairs, Defense and Arms Control Robert Bell, and codified in Presidential Decision Directive 17 (PDD-17) in December 1993, would become known as the "Grand Bargain".[46] The Grand Bargain would essentially institutionalise Clinton's approach to BMD and ensure that US missile defence plans would remain limited in the future, and by doing this, remove a possible cause of Russian intransigence to further arms reduction deals. As part of this policy, Clinton also agreed to recognise the Soviet successor states as additional members of the agreement, strengthening Russia's hand in further ABM Treaty

[43] Interview with Robert Joseph (29th July 2010). According to David Auerswald: "The Clinton administration was never a big fan of missile defense … defusing the known Russian missile threat took precedence over defense against possible rogue state attack, and the administration believed arms control might be jeopardised by a missile defense … as a result, the administration requested ever-decreasing funding for overall missile defense research and development during its first term". Auerswald (2001) 67

[44] Interview with Robert Joseph (29th July 2010)

[45] James Hackett, "Resolving the ABM impasse", *The Washington Times*, (22nd November 1993); Michael Gordon, "US seeking to loosen missile-defense curbs", *New York Times*, (3rd December 1993)

[46] See Bill Gertz, *"Betrayal: how the Clinton administration undermined American security",* (Washington DC, Regnery Publishing Inc: 1999) 55-62

negotiations.[47] As Michael Krepon pointed out at the time, "By steering a sensible course President Clinton can have both an effective theatre missile defence and deeper cuts in nuclear weapons".[48]

Talks about reaching an ABM Treaty demarcation agreement began in November 1993 with the US delegation seeking to clarify what was and wasn't legal under the Treaty. US negotiators were keen to push for the acceptance of any system that had no *demonstrated* capability to intercept a target missile moving faster than 5kmp/s,[49] while their Russian counterparts were staunchly opposed to anything that might appear to have a limited strategic capacity.[50] Consequently, in early 1994, the Russians suggested that in addition to US proposals, a 3kmp/s limitation should be placed on interceptor missiles, and that the range of the target missile should be no more than 3500kms.[51] Although this would allow for THAAD, Patriot and the Navy's Lower Tier system, the US delegation were concerned that such a demarcation would prevent the development of several other important projects.[52]

In early March 1994, Clinton's room for manoeuvre in these talks was significantly encumbered by all 44 Republican Senators as they urged the president to resist any restrictions on missile defence systems underneath the administration's original proposal, and stressed that any agreement must be submitted to the Senate for approval. With this in mind, during a meeting in Moscow on 11th - 13th July 1994, US negotiators presented the Russian delegation with an updated proposal that would accept a 3kmp/s limit on both land and lower tier sea-based systems, but would also retain the possibility of conducting six flight tests a year of interceptors travelling at 4-

[47] Mark Clark, "The Clinton legacy on ballistic missile defense", *Comparative Strategy,* 19 (2000), pp201-219: 203; Gertz (1999) 56
[48] Krepon (1995) 24
[49] Dunbar Lockwood, "US continues to press for looser limits on ABM Treaty", *Arms Control Today,* (September 1994)
[50] Dunbar Lockwood, "US rejects Moscow's proposal to limit ABM interceptor speeds", *Arms Control Today,* (May 1994)
[51] Gertz (1999) 60
[52] For more on this, and on the demarcation agreements in general, see Amy Wolf, "Anti-ballistic missile treaty demarcation and succession agreements: background and issues", *Congressional Research Service*, (27th April 2000)

4.5kmp/s.[53] In August, the Russian delegation accepted the 3kmp/s limitation but continued to restrict anything that travelled at a higher speed. However, despite the lack of progress on demarcation, and consequently in beginning testing and development of the administration's favoured TMD systems, Clinton and Yeltsin issued a joint statement confirming the sanctity of the ABM Treaty in September 1994.[54]

At the same time as Clinton was recalibrating US ballistic missile defence policy at home and abroad, Congress was pushing for even bigger cuts in the missile defence budget. The Democrats had retained control of both houses of Congress in the 1992 elections, and there was little to suggest that the party's previous dislike of BMD, or belief in the importance of the ABM Treaty, had changed. Much like President Clinton, the Democratic controlled Congress was keen to reduce the defence budget and recalibrate US national security policy to what it perceived to be a new and less threatening environment. Democrats in Congress were equally keen to continue working towards further arms reductions with Russia – a goal which they believed was highly contingent on retaining the centrality and credibility of MAD and the ABM Treaty – to ensure the safety of the vast ex-Soviet nuclear stockpile.[55] Consequently, Clinton's reorganisation of the American BMD programme met with little resistance in Congress; Democrats were pleased that the ABM Treaty would remain "the cornerstone of US strategic thinking", while even BMD advocates in the Republican Party, with little threat upon which to base any objection, were relatively acquiescent.[56] As a result, by the end of 1993 Congress had voted to reduce Clinton's first BMD budget request by nearly $1b to $2.6b, of which $1.5b would be for theatre missile defence systems, and just $650m for research into strategic defences. Congress also included language in the Bill officially repudiating the 1996 national missile defence deployment goal contained in the 1991 Missile Defense Act, and made half of the research funds for the programme contingent upon an

[53] Lockwood (September 1994). This would allow testing of the Navy Lightweight Exoatmospheric Projectile (LEAP), or Terminal High Altitude Area Defense-2 (THAAD2) programmes.
[54] "Joint Statement on Strategic Stability and Nuclear Security", *William Clinton Presidents Public Papers,* (29th September 1994) 1899-1901
[55] Confidential interview (B)
[56] Fitzgerald (2001) 490; Paul Musgrave, "The strange rebirth of missile defense: why Republicans resurrected Reagan's dream", *Missouri Valley Journal of Social Science,* 7:1 (2003), pp115-150: 20

ongoing review into the compliance of various systems with the ABM Treaty.[57] Clinton signed this Bill into law with little complaint.[58]

One of the main reasons Congress voted for such large cuts in Clinton's BMD request in 1993 was because lawmakers simply not did feel that the threat of missile attack justified significant funding for anything other than the low-key effort proposed by the president. Russia was no longer considered to be a strategic adversary, while substantial progress was being made through the Nunn-Lugar initiative and other agreements to reduce any threat of accidental attack or proliferation from the former Soviet Union.[59] What is more, Congress felt that after the 1991 Gulf War, only North Korea presented a serious threat, but while tensions did arise in mid 1994 over Pyongyang's suspected nuclear programme[60], it was felt that a mix of diplomacy and sanctions could counter this threat.[61] Moreover, the administration felt that it would have ample time to respond should any new strategic missile threat emerge. This feeling of security was reiterated in late 1993 as the CIA released its latest National Intelligence Estimate into the ballistic missile threat to the United States. The Estimate suggested that "only China and the CIS strategic forces currently have the capability to strike the continental US", and that; "Available information shows the probability is low that any other country will acquire this capability during the next 15 years".[62] The Estimate also went on to suggest that the missile programmes that were currently underway in much of the third world were primarily regional and defensive in nature.[63] While this had a significant impact on the Clinton administration – in a sense, seeming to validate its restructuring of BMD – it also had a profound influence on lawmakers, particularly Democrats in Congress, who remained intent on limiting any costly NMD development. The result was that the Clinton administration's $3.25b BMD budget

[57] Dunbar Lockwood, "Congress approves defense bill, cuts back BMD spending", *Arms Control Today*, (December 1993)
[58] Garrett (2005) 201
[59] For more on this see Amy Woolf, *"The Nunn-Lugar cooperative threat reduction programs: issues for Congress", (New York: Novinka Books: 2003)*
[60] The first North Korean nuclear crisis was resolved diplomatically in October 1994 as the US and North Korea signed the agreed framework. For more on this see Joel Witt, Daniel Poneman & Robert Gallucci, *"Going critical: the first North Korean nuclear crisis",* (Washington DC, Brookings Institution Press: 2003)
[61] Jeffrey Richelson, *"Spying on the bomb",* (New York, Norton & Company: 2007) 525
[62] NIE93-17 (17th November 1993)
[63] Ibid

request – of which $2b was designated for theatre and battlefield defences – would meet significant resistance in Congress.[64] In fact, by September, Congress had voted $2.8b for BMD, $400m less than Clinton had requested, but meeting the $2b requested for TMD programmes.[65] In addition to this, language had been included making it clear that any substantive change in the ABM Treaty would require Senate approval, and that funds would be restricted for any BMD activities considered inconsistent with the "traditional" interpretation of the Treaty.[66]

During 1993 and 1994, the US BMD effort was comprehensively restructured and recalibrated to meet the perceived necessities and realities of a new era. Funding was cut, priorities were altered, and while support remained for ABM Treaty compliant TMD programmes such as Patriot and THAAD, neither Clinton nor Congress was interested in pushing for strategic defences. The reason for this was the Clinton administration's determination to reorganise the US BMD effort to meet what it perceived to be the real threats of the post-Cold War era, and because the ABM Treaty was viewed as the primary vehicle for international stability and for further Russian arms reductions. With Democratic lawmakers in Congress equally keen to reduce BMD funding and to maintain the ABM Treaty as the cornerstone of strategic stability, and who felt that current threats did not justify anything more than what Clinton was proposing, support and interest in missile defence gradually eroded.

1995: The Republican challenge in Congress

Although support for national missile defence had never really gone away amongst conservative think tanks, large defence contractors, and small groups within Congress, there was limited enthusiasm for a revived NMD push in Congress or the White House during 1993 and 1994. The

[64] Arthur Atkins, "Clinton proposes $263.7bn for defense weapons programmes in '95", *Arms Control Today*, (March 1994)
[65] Arthur Atkins & Dunbar Lockwood, "House panel approves $263.3 billion FY95 defence authorization bill", *Arms Control Today*, (June 1994)
[66] Arthur Atkins & Dunbar Lockwood, "Conferees approve $263.3bn in defense spending for FY95", *Arms Control Today*, (September 1994)

renewed Republican drive for national missile defence would instead originate amongst a small but vocal group of conservative activists coordinated by the Heritage Foundation, including former SDIO Directors Henry Cooper and James Abrahamson and Center for Security Policy founder Frank Gaffney, and would formally begin with the establishment of the "Coalition to Defend America" in mid 1994.[67] The Coalition, which was composed of Republican Congressman, retired members of the US military and many officials from the Reagan administration, launched a radio and television advertising campaign around the need to revive the nation's quest for a national missile defence, and successfully persuaded 193 Republican Congressional candidates to sign a pledge to revive NMD.[68] This group, but particularly Gaffney, managed to convince the Republican Party leadership to include the deployment of a national missile defence as part of their Contract with America: highlighting its utility both as a galvanising conservative strategy and useful weapon to attack the incumbent Clinton administration.[69] As a result, the idea gained traction with Republican leaders such as Newt Gingrich (R-GA) during 1994, as strategists sought to use BMD at least in part as an important weapon with which to attack Clinton on defence and security in the forthcoming presidential election.[70] According one senior official, the Republican Party adopted the policy largely because they felt that they needed a "military plank to the Contract, and missile defence was virtually the only defence or military platform that the Republican Party leadership could agree on".[71]

The Republican Party fought the 1994 election on a range of policies contained in their Contract with America manifesto.[72] The National Security Restoration Act, the sixth plank of the Contract, and the only one not dealing with domestic policy, set as its objective to "rapidly provide

[67] For more on this see Cirincione (1997) 40
[68] Peter Stone, "Aiming high", *The National Journal*, (4th February 1995)
[69] Musgrave (2003) 116. According to Joseph Cirincione: "The Republican Party arrived at their strategy by listening to a group of conservative activists with roots in the Reagan years … the Heritage Foundation and the Center for Security Policy in particular pressed to insert missile defense into the 1994 contract". Cirincione (1997) 40
[70] Eisendrath et al (2001) 39; Graham, (2003) 25; William Hartung & Michelle Ciarrocca, "Star wars II: here we go again", *The Nation*, (19th June 2000). Joseph Cirincione argued that "The entire conservative defense establishment was sure that this would be the wedge issue that would expose President Bill Clinton's weakness in 'failing to defend America'". Cirincione (1997) 39-40.
[71] Confidential interview (B)
[72] See Gingrich (1994)

the American people, United States Forces, and United States allies with a capable defense against missile attacks".[73] It went on to state that:

> It shall be the priority of the United States to deploy at the earliest possible moment an antiballistic missile system that is capable of providing a highly effective defense of the United States against ballistic missile attacks … and provide at the earliest possible moment highly effective theatre missile defenses to forward deployed and expeditionary elements of the Armed Forces of the United States and to friendly forces and allies of the United States.[74]

However, and although a consensus had formed around developing TMD, not all Congressional Republicans thought that the resurrection of a commitment to NMD was worth the price, and many remained staunchly devoted to the core principles of cutting taxes and balancing the budget contained in the Contract.[75] Outside of Congress, the reaction to the "Republican revolution" was equally mixed. Many national editorial writers were critical of the "revival of Star wars",[76] while polls conducted at the time suggested that public opinion found increased defence spending to be the least compelling plank of the Republican manifesto.[77] Democrats in Congress – who had little problem with the provision in the proposed Bill to implement advanced theatre missile defences – remained firmly against an expanded NMD deployment programme and particularly against contravening the ABM Treaty. Democrats also struck a popular chord with voters by branding an accelerated NMD programme as strategically unnecessary and a waste of billions of dollars.[78]

In late 1994, the rejuvenated Republican Party won both Houses of Congress for the first time in over 40 years, and the new Republican leadership wasted little time in bringing pressure to bear on President Clinton. Within weeks of taking office, Newt Gingrich (R-GA) and other Republican House leaders sent Clinton a letter outlining their intention to block any negotiations with Russia that might preclude accelerated development and deployment of a national or advanced theatre

[73] Ibid
[74] Ibid
[75] Graham (12th December 1994)
[76] Musgrave (2003) 122
[77] David Morrison, "Defense deadlock", *The National Journal*, (4th February 1995)
[78] Graham (12th December 1994); Burns & Brune (2003) 157

missile defences, and made it clear that they did not support Clinton's approach to Russia and the ABM Treaty. Clinton replied a few weeks later:

> The administration is firmly committed to two fundamental objectives in the area of missile defenses. First, we believe it is critical to preserve the ABM Treaty. This important Treaty remains the cornerstone of US security policy and our new relationship with Russia. Second, we are committed to deploying highly effective theatre missile defence systems.[79]

Nevertheless, the Republicans were determined to challenge virtually every aspect of the Clinton administration's policy on BMD, and replied by urging the president to cease all attempts to abide by or modify the ABM Treaty, pending a review by a Congressional select committee.[80]

The Republican leadership also wasted little time in introducing a missile defence Bill into the House of Representatives, calling for the deployment of a ground-based, multi-site national missile defence system by 2003.[81] However, the new legislation immediately came under fire from Democrats in the House, with Congressman John Spratt (D-SC) proposing a successful amendment to the Bill by forcing the House to choose between funding NMD and funding military readiness (including TMD). Presented with this choice two-dozen House Republicans crossed party lines to vote for it.[82] After much debate, the final version of the House Bill placed NMD as a third priority for the BMDO, and although continuing to order deployment "as soon as practicable" was quick to say this would be "subject to the availability of funding".[83] This omission was one of the rare occasions when a provision from the Contract didn't make it onto the floor of the House in the first 100 days of the new Congress.[84] One of the reasons for this, as David Morrison had presciently suggested at the time, was because a small group of Republican deficit hawks were not convinced of the financial prudence of a large-scale BMD programme, joined with Democrats to stall the

[79] Quoted in Garrett (2005) 203
[80] David Auerswald, "The President, the Congress and American missile defense policy", *Defence Studies*, 1:2 (2001), pp57-82: 67
[81] Musgrave (2003) 140
[82] Ibid
[83] "House votes to curb anti-missile deployment rate", *Arms Control Today* (March 1995)
[84] Garret (2005) 204

renewed drive to deploy.[85] In fact, even Newt Gingrich had earlier declared: "I'm a hawk – but a cheap hawk".[86]

Nonetheless, in May 1995 the House National Security Committee (formerly the Armed Services Committee)[87] voted to increase Clinton's $2.9b BMD budget request by $628m, with a large proportion of these extra funds ($550m) going towards NMD, but refrained from including language committing the nation to deployment.[88] After a Democratic amendment that would have redirected the $628m to housing allowances for soldiers narrowly failed, the Bill sent to the Senate still upheld that "it is the policy of the United States to deploy at the earliest possible date … a national missile defense system".[89] As this was playing out in the House, Senator Strom Thurmond (R-SC) introduced the National Security Revitalization Act in the Senate, and by the end of June the Senate Armed Services Committee had declared it the policy of the United States to deploy multiple site national missile defences by 2003; arbitrarily and unilaterally declared that theatre missile defences were permitted under the ABM Treaty, and attempted to ban the Clinton administration from negotiating with Russia over demarcation. The Committee also added $500m to the administration's original budget request.[90]

After numerous proposed Democratic amendments were narrowly defeated, thanks in part to a call from Senator Bob Dole (R-S) that "all Republicans hold firm", Senator Carl Levin (D-MI) threatened a Democratic filibuster on the Senate floor.[91] Facing the prospect that the entire Bill would stall, a group of moderate Senators in the Armed Services Committee decided to put together a compromise package that would be considered when the Senate reconvened in September 1995. In a move reminiscent of the 1991 basis for consensus plan, Republicans John Warner (R-VA) and William Cohen (R-ME), and Democrats Sam Nunn (D-GA) and Carl Levin (D-MI), put together a

[85] Morrison (4th February 1995)
[86] Ibid
[87] The Republican Party renamed this committee the National Security Committee in 1994, it would later be renamed the House Committee on Armed Services.
[88] John Isaacs, "Cold warriors target arms control", *Arms Control Today*, (September 1995)
[89] Musgrave (2003) 140
[90] Isaacs (September 1995)
[91] Ibid

middle-ground plan that would mandate development not deployment of a national missile defence system.[92] However, House Republicans rejected this new Senate proposal in conference, and restored the original language.[93] In a further effort to force the Clinton administration to change its BMD policy, 16 Senate Republicans sent the president a letter during December criticising him for his failure to move ahead with NMD.[94]

The Clinton administration had spent much of 1994 focussing on ABM Treaty demarcations with Russia, and by May 1995 had come to an agreement on lower velocity TMD systems. The demarcation would not permit interceptors travelling faster than 3kmp/s or their testing against target missiles travelling at over 5kmp/s and a range of over 3500km. This would allow for the development of THAAD, Patriot and the Navy's Lower Tier System, and as a result, the Clinton administration no longer appeared to be in a rush to negotiate further ABM Treaty demarcations on higher velocity systems.[95] At the same time, the administration had also spent a significant amount of time defending its $2.9b BMD budget request, and making it clear to Congress that it would not accept any major changes to BMD policy, especially not Congressional provisions to deploy NMD. With this in mind, Clinton ordered the BMDO to continue with its NMD "technology readiness programme", which would provide a hedge against the emergence of a future ballistic missile threat to the US homeland, but would wait for that threat to emerge before beginning deployment or deciding exactly what to do.[96]

It was in this context that Secretary of Defence William Perry (February 1994 – January 1997) would send a letter to Senator Tom Daschle (D-SD) making it clear that the Clinton

[92] Graham (2003) 25
[93] Ibid
[94] Gertz (1999) 64
[95] Powaski (2003) 179
[96] Morrison (4th March 1995)

administration would fight any new push to force construction of NMD.[97] Perry's letter took particular issue with the 1995 Defense Authorization Bill:

> The Bill in its current form continues to contain objectionable provisions that raise serious constitutional issues and unduly restrains our ability to execute our national security and foreign policy responsibilities.[98]

In particular, he suggested that the provision for NMD was a "needless waste of billions of dollars'" that would "lock into a specific technological option that may become redundant as the threat arises", and would require "multi-sites that would mean collision" with the ABM Treaty.[99] As a result, when it came to him to sign, Clinton vetoed the Bill, later saying that:

> I felt I had to do it because it mandated the complete deployment of a national missile defence system by 2003, well before a workable system could be developed or would be needed, moreover such an action would violate our commitments under the ABM Treaty and jeopardize Russia's implementation of START I … [he went on the say that] no responsible president, Republican or Democrat could have allowed that defence bill to become law.[100]

Ultimately in order to get the Bill passed, lawmakers removed the language mandating deployment and settled for doubling the administration's request for NMD from $371m to $745m.[101]

Although renewed drive was provided for NMD by the Republican leadership in Congress, this pressure was not enough to push the Clinton administration into making any substantial changes to BMD strategy during 1995. The primary reason for this was that there didn't seem to be any threat that justified spending vast amounts of money on a substantial NMD programme, or give reason for deploying anything other than what the Clinton administration was proposing. Of equal importance was the fact that some fiscally conservative Republicans, particularly in the House, were determined to reduce taxes and balance the defence budget, and therefore simply couldn't countenance a vast new BMD spending plan. What is more, the Democratic leadership in Congress

[97] Bill Gertz, "House seeks creation of nationwide missile defense", *The Washington Times,* (9th January 1995)
[98] Letter from Secretary of Defense Perry on the 1996 Defense Authorization Bill to Tom Daschle Democratic Leader US Senate, Secretary of Defense, Washington, (15th December 1995)
[99] Ibid
[100] Bill Clinton, *"My life",* (New York, Alfred A Knopft Publishers: 2004) 690. Clinton also later said: "This one was tough because the legislation included a military pay increase and a larger military housing allowance, both of which I strongly supported …the bill also restricted the president's ability to commit troops in emergencies".[100]
[101] Graham (2003) 26

remained firmly behind Clinton, and seeing no need to rush ahead with NMD, continued to view the ABM Treaty as the cornerstone of national security.

1996: Clinton's 3+3 plan

At the start of 1996, the Republican Party leadership remained keen to push the Clinton administration to commit to deploying a national missile defence system, at least partly because they believed it could be an important issue in the forthcoming presidential elections.[102] Republican presidential candidate Senator Bob Dole (R-KS) in particular, appeared determined to use the issue of BMD to attack the Clinton administration as being weak on defence and thus to provide a natural wedge issue in the approaching election.[103] For Dole and other leading Republicans, the issue of NMD appeared to have three main strengths; firstly, it provided an issue with which to differentiate presidential candidate Bob Dole and the Republicans from Clinton, especially as both retained similar views about America's more general role in the world; secondly, because NMD would be a productive issue with which to the make Clinton look weak on defence policy; and, thirdly it was an issue around which most Republicans could gather.[104] In fact, national security analyst at the Federation of American Scientists John Pike suggested that the "primary purpose [of the Republican push for BMD] was to create a campaign sound bite that Clinton was unwilling to 'defend America"'.[105] Nevertheless, Dole spoke effusively about the threat from North Korea, which he described as being "armed to the teeth", and also argued that America remained defenceless not because "America is lacking in technological knowhow", but because it is "lacking the presidential leadership to get it done".[106]

[102] Philip Shenon, "GOP to press missile defence as Clinton test", *New York Times,* (13th May 1996)
[103] According to Francis Fitzgerald, "Dole had never displayed much enthusiasm in the past, but, according to pundits, the issue would clearly differentiate him from Clinton, without alienating two thirds of voters". Fitzgerald (2001) 493
[104] James Kitfield, "America's not listening", *The National Journal,* (13th July 1996)
[105] John Pike, "Star wars – clever politics in the service of bad policy", *Journal of the Federation of American Scientists,* (September/ October 1996)
[106] Quoted in Shenon (13th May 1996)

Dole and Gingrich introduced their respective Defend America Bill's, calling for the deployment of a national missile defence system (able to protect all 50 states, including Alaska and Hawaii) by 2003, into the Senate and House in early 1995.[107] The legislation called for additional sea, space and land based capabilities to be added later, and insisted on immediate negotiations to amend the ABM Treaty.[108] The intent was to be able to protect against not just a few missiles launched from a rogue state, but also from a possible unauthorised or accidental missile launch from a major nuclear power with anything up to 200 warheads.[109] Although the Bill did not stipulate instant withdrawal from the ABM Treaty, it made it clear that if negotiations did not produce a result within a year, Congress and the White House should hold consultations about withdrawing.[110] Dole described the act as "one of the key defining pieces of legislation that Congress will consider this year" and that "missile defense must be America's top priority", while Gingrich declared it "the most important national defense debate since [Winston] Churchill argued for building radar".[111] Despite the fact that public opinion polls continued to suggest that very few voters cared much about missile defence,[112] by spring 1996, both the Senate and House Armed Services Committees had approved the Defend America Bill.[113] A fundamental reason for this support was the belief that the legislation would trigger another veto from Clinton, and would therefore provoke confrontation during the forthcoming presidential campaign. In this sense, it was as much Republican Party politics as it was the sincere desire of Republican lawmakers to deploy a national missile defence that drove the legislation forward in 1996.[114]

[107] Graham (2003) 26. According to Joseph Ciricione, the Defend America Bill had been driven and designed by Frank Gaffney, head of both the Center for Security Policy and the Coalition to Defend America. See Cirincione (1997) 40-41.
[108] Auerswald (2001) 68
[109] Tim Weiner, "Vote cancelled on Dole's bll for a costly missile defence", *New York Times,* (23rd May 1996)
[110] Bil Gertz, "Dole accuses Clinton of being soft on defense", *The Washington Times,* (22nd March 1996)
[111] Quoted in Cirincione (1997) 39
[112] According to Richard Burns & Lester Brune, "Americans living outside of Washington's beltway could find no real reason that effected their safety and they paid little attention to Dole's complaints about the lack of a missile defense system". Burns & Brune (2003) 157, and in the words of Paul Musgrave: "It wasn't just that the electorate had no preference between Dole's and Clinton's apple pies, but that voters didn't know that the two candidates had baked". Musgrave (2003) 28-9.
[113] Garrett (2005) 205; Cirincione (1997) 50; Kitfield (13th July 1996)
[114] Cirincione (1997) 40

Clinton described Dole's BMD stance as "not only unnecessary" but also potentially "harmful to our broader national defense interests" because it would "divert vital defense funds from other more pressing needs".[115] He went on to portray the Defend America Bill as "imprudent and dangerous" because it would "force the Pentagon to commit prematurely to a technological option that maybe outdated when the threat emerges". Above all Clinton argued, this would "put at risk continued Russian implementation of START I and START II".[116] In a speech during June 1996, Dole referred to Clinton's continued opposition to deploying a national missile defence as "one of the most negligent, short-sighted, irresponsible and catastrophic policies in history."[117] However, before the Defend America Bill was to be debated in Congress, a report from the Congressional Budget Office (CBO) into the potential cost of Dole's plan severely undermined support for NMD in Congress, and ultimately caused the Republican candidate to drop the Bill. The CBO estimate suggested that it could cost anything up to $60b to implement the provisions contained in the "Defend America Bill", and that this did not include costs that would need to be paid each year in order to keep the defence functioning after the initial deployment.[118] This was nearly 12 times what leading Republicans had originally suggested that the system would cost.[119] The impact was considerable; many freshman Republicans in the House, particularly fiscal conservatives committed to balancing the budget and cutting defence spending were "spooked", while in the Senate the estimate made sure that Republicans were unable to muster enough support to overcome a Democratic filibuster.[120] Although in mid-July 40 Congressional Republicans filed a lawsuit against President Clinton and Secretary of Defense Perry accusing them of "disregarding Congresses intent on missile defence policy", and attempted to force the administration to move more quickly towards developing missile defences, Republican leaders decided to withdraw the Bill from Congress entirely during the Party caucus in August, and Bob Dole hardly mentioned BMD

[115] "Statement of Administration Policy - S1635 Defend America Act of 1996", Executive Office of the President, Office of Management and Budget, Washington DC, (3rd June 1996)
[116] Ibid
[117] Quoted in Musgrave (2003) 27
[118] "Potential costs of operating and supporting the defenses included in the Defend America Act of 1996", *Congressional Budget Office*, (26th July 1996)
[119] Weiner (23rd May 1996)
[120] *International Herald Tribune* (6th June 1996)

again during the run up to the 1996 presidential election.[121] In the words of Joseph Cirincione – president of the Ploughshares Fund:

> Faced with united Democrats, divided Republicans, military opposition, budget pressures, and a sceptical public, Senate and House supporters of "Defend America" conceded defeat.[122]

The battle raging between Democrats and Republicans and between Dole and Clinton was also being shaped and driven by conflicting assessments of the missile threat facing the US. In particular, debate was becoming centred on the conclusion of the latest National Intelligence Estimate in into the ballistic missile threat facing the US. The main conclusion of the Report, which was released in late 1995, was that:

> No country other than the major declared nuclear powers will develop or otherwise acquire a ballistic missile in the next 15 years that could threaten the contiguous 48 states and Canada.[123]

The Estimate went on to suggest that US intelligence would "detect any indigenous long-range ballistic missile program many years before deployment", and that unauthorised or accidental missile launches remained only a remote possibility.[124] Although the estimate was welcomed by Democrats in Congress – who saw no strategic reason or necessity to waste money trying to address a threat which didn't exist – it came under strong attack from Republicans in Congress, with Congressman Curt Weldon (R-PA) describing the NIE as "a political document drafted to support the Clinton administration's views on BMD".[125] Clinton saw the document as vindication of his policy, and reiterated his commitment not to spend vast amounts of money on a NMD system that could be either unnecessary if the threat failed to materialise, or technologically or strategically

[121] Graham (2003) 27
[122] Cirincione (1997) 53
[123] NIE95-19, "Emerging missile threats to North America during the next 15 years" (November 1995)
[124] Ibid
[125] Quoted in Burns & Brune (2003) 157

obsolete if and when in did. Consequently, Clinton requested $2.8b for BMD in fiscal year 1997 - $643m less than the previous year.[126]

Nevertheless, after several months spent studying different options for an expanded missile defence programme – primarily in response to the pressure from Congress – in the spring of 1996 the Pentagon announced a stepped-up effort to develop a national missile defence system for the US homeland.[127] The 3+3 plan, which would be different from both GPALS and Bob Dole's Defend America proposal, would replace the current "technology development scheme" with a deployment programme.[128] Under the new plan, the Pentagon would conduct NMD research and development for three years beginning in fiscal year 1997 after which a deployment decision would be made in June 2000. If Clinton then judged that the continued existence of a rogue state threat and the US ability to field an effective limited NMD necessitated and allowed for it, then he would push ahead with deployment beginning in 2003.[129] The plan was therefore designed to provide a hedge against the emergence of a future long-range missile threat but also allow Clinton to help blunt the Republican BMD attack.[130] It also ensured that the administration would have the best technology available if-and-when a new strategic threat emerged, without putting at risk continued strategic arms reductions with Russia.[131] In the words of Undersecretary of Defense for Policy Walt Slocombe:

> With the 3+3 plan, we would always be in a position to deploy something within the timeframe of threat development. E.g., Iran was not suddenly going to emerge with a ballistic missile. We felt that we would be able to get a defence up before the threat had materialised".[132]

[126] John Diamond, "Senate Republicans want more money for missile defense", *Washington Dateline,* (7th March 1996)
[127] David Fulghum, "Missile studies saturate Pentagon", *Aviation Week & Space Technology,* (25th September 1995)
[128] According to Craig Eisendrath et al "the plan was to demonstrate to Americans that they supported national missile defense, but disagreed on the timetable for deployment … the plan was to build a shield without dragging the US into a serious conflict with the Russians". Eisendrath et al (2001) 22-3.
[129] Auerswald (2001) 68
[130] Graham (2003) 27
[131] "Statement of Administration Policy – S1635 Defend America Act of 1996, Executive Office of the President, Office of Management and Budget, (3rd June 1996)
[132] Interview with Walt Slocombe (3rd August 2010)

The total costs of the proposal introduced in 1996 and projected for fielding in 2003 was estimated by the Pentagon at about $8b – substantially less than the Dole-Gingrich plan.[133] Moreover, the administration continued to argue that the possibility of a rogue nation or terrorist attacking the US by far less "exotic" means was a far more pressing and likely concern, and that the development of any new missile threat to the homeland would be detected long before it became operational.[134] According to Strobe Talbott, the Clinton Administration had been "urged by leading Democrats to come up with an alternative scheme that was compatible with the ABM Treaty" to help blunt the consistent Republican pressure.[135]

During a speech to the United States Coast Guard Academy in May 1996, Clinton declared that the US was pursuing a "strong, sensible national missile defense program based on real threats and pragmatic responses", but that the administration's first priority "is to defend against existing or near term threats, like short and medium-range missile attacks on our troops in the field or our allies". The correct way to combat future threats, Clinton went on, was to stop the spread of WMD by building smart missile defences which take into account the best technology if and when the threat arises in the future.[136] With this in mind, the 3+3 plan was designed in three stages; the first (C1) would involve the placement of 20 interceptors in Alaska, a new X-band radar in the Aleutian Islands and construction of a BMC3 (Battle Management Command Control and Communications) system, and *could* be operational by 2005; the second (C2) would involve 100 interceptors at Alaska, with additional X-band radars in Alaska, Great Britain and Greenland, which *could* be operational by 2007; the third (3) would have up to 250 interceptors at Alaska and North Dakota and additional X-band radars on the US coast and in South Korea, this could be done by 2010-2011. C1 would have the capability to defeat a few warheads that only employed simple penetration aids;

[133] Lakoff (2008) 129
[134] Shenon (13th May 1996)
[135] Talbott (2002) 377
[136] "Remarks to the United States Coast Guard Academy commencement in New London, Connecticut", (22nd May 1996)

C2 could defeat a few 10s with more sophisticated countermeasures, while C3 could defeat a few 10s with complex penetration aids and countermeasures.[137]

Clinton further elaborated on the thinking underpinning the 3+3 plan at the August Democratic national convention:

> We are developing a sensible national missile defense, but we must not, not by the year 2000 – squander $60bn on an unproved, ineffective Star Wars program that could be obsolete tomorrow.[138]

As a result, the administration remained committed, at least rhetorically, to be in a position to deploy a limited NMD system by 2003, and thus to have a theoretical capability to counter any new long-range missile threat should it emerge sooner than predicted by the intelligence community.[139]

Nevertheless, the deployment plan remained ambitious. Lt General Malcolm O'Neill, head of the BMDO between November 1993 and May 1996, argued that there would be "little margin for error" and that "lengthy bidding procedures would have to be foregone".[140] His successor at the BMDO, Lt Gen Lester Lyles (August 1996 – May 1999), also expressed concern that a workable national missile defence system could be deployed in as little as six years.[141] Part of the reason for was the problems experienced with THAAD during 1995 and 1996 – the technology upon which the long-range interceptors for the NMD system would be based – but also because of the emergence of reports suggesting that the public and Congress had been deceived of the test results of the Ground-Based Interceptor during 1995 and 1996.[142] Despite this, Congress agreed to appropriate $3.7b for BMD, an $855m increase in Clinton's request, which would include $833m for NMD.[143]

[137] Lakoff (2008) 129
[138] "Clinton's Acceptance Speech at Democratic National Convention", *Presidents Public Papers,* (29th August 1996)
[139] "Remarks to the United States Coast Guard Academy Commencement in New London, Connecticut", (22nd May 1996)
[140] Burns & Brune (2003) 173-4
[141] Ibid
[142] Lakoff (2008) 129 & 133
[143] "$244.8bn DOD bill tightens restructuring, cuts tacair, saves MEADS", *Aerospace Daily* (16th September 1996)

At the end of 1996, the dynamics of the BMD debate were altered again by the conclusions of a report chaired by former CIA Director Robert Gates into NIE95. The Gates Review, which would include a panel of "independent, nongovernmental individuals with appropriate expertise and experience", had been ordered by the Republican Congress in the wake of the 1995 intelligence estimate to review its underlying assumptions and conclusions.[144] When its findings were released, the Gates Report found no "evidence of politicization" in the original NIE, and was "completely satisfied that the analysts" views were based on the evidence before them and their substantive analysis. Moreover, that:

> Unsubstantiated allegations challenging the integrity of the intelligence community analysts by those who simply disagree with their conclusions, including members of Congress, are irresponsible.[145]

Although another report from the GAO suggested that the certainty contained in NIE95 might have been "overstated",[146] the net effect was that missile defence actually played a very minor role in the 1996 presidential election, and certainly far less than had been hoped for by the Republican leadership. According to one administration official, the Gates Report,

> … Strengthened the belief within the Clinton administration that any new strategic missile threat remained many years away, and that any new missile threats would be spotted long before they became operational, giving the administration ample time to respond.[147]

Another Clinton administration official would later suggest that the Gates Report was also crucial in Democrats keeping a majority in favour of the administration's plans in Congress.[148]

Clinton adapted his BMD strategy even though evidence suggested that a new strategic ballistic missile threat to the US homeland remained many years away, despite any significant technological push, and regardless of a lack of public interest in either the threat or BMD. The

[144] Craig Cerniello, "Panel upholds NIE assessment of ballistic missile threat to US", *Arms Control Today,* (January/ February 1997). According to Cerniello, "The then CIA Director John Deutch appointed Gates to chair the independent panel, which included Ambassador Richard Armitage, Sidney Drell, Arnold Kanter, Janne Nolan, Henry Rowen and retired Air Force General Jasper Welch. The conclusions reached by the seven panel members were unanimous".
[145] "NIE95-19: Independent Panel Review of "Emerging Missile Threats to North America During the Next 15 years", (23rd December 1996)
[146] "Foreign missile threats: analytical soundness of certain National Intelligence Estimates", *United States General Accounting Office,* (August 1996)
[147] Interview with Walt Slocombe (3rd August 2010)
[148] Interview with Robert Bell (6th March 2010)

adoption of a national missile defence deployment plan must therefore be seen as a product of domestic politics and of political calculation designed to neuter the Republican BMD challenge. However, this approach also gave the administration both a capacity to respond should a new missile threat emerge, while at the same time allowed Clinton to maintain control over the future of NMD policy and make sure missile defence would not become an important election issue in 1996. Nevertheless, and although NMD would continue as a secondary priority to theatre missile defence development, the decision to begin a deployment readiness programme marked a distinct change in Clinton's strategy.

(3) Assessing the drivers of policy, 1993-1997

Changes in the international system and the lack of credible missile defence technology explain the loss of enthusiasm and push for a large scale missile defence plan during 1993 and 1994. They also, to an extent, explain why President Clinton appeared reluctant to make any large-scale commitment to BMD during 1995 and 1996. However, these dynamics really only explain a small part of the evolution of policy during this period, instead it was the importance of domestic variables, particularly the institutional balance between president and Congress, that caused the rhythms of policy between 1993 and 1997.

International and technological factors

The international system altered very little between 1993 and 1996, and this arguably explains the decisions taken by the Clinton administration to reduce and recalibrate the US BMD effort. It also explains why GPALS no longer seemed to be an appropriate response to the threats that the US looked likely to face in the near future. The gradual move away from the threat of the Russian nuclear arsenal (and the possibility of an accidental launch) and towards the growing threat from the

proliferation of short-range and battlefield missile technology, also explains why the focus of the programme shifted towards tactical and theatre ballistic missile defence technologies. Above all, international pressures provide a strong justification of why the Clinton administration focussed its time and attention on battlefield and not national missile defences.

Nevertheless, changes in the international system do not explain why Clinton decided to unveil his 3+3 deployment plan in 1996, especially in light of his very public desire to downgrade the programme in 1993. The plan, which if fully enacted, would involve deploying up to 250 missile interceptors in Alaska and North Dakota by 2007, contravening the ABM Treaty, and arguably representing an even more ambitious programme than Bush's GPALS. Moreover, Clinton decided to unveil this new plan despite the fact that the Intelligence Community believed it would be many years – if ever – that the US faced a new direct threat to the homeland from a limited missile attack.[149]

Some of these dynamics can be explained by developments in technology. The problems experienced with GPALS and Brilliant Pebbles essentially underpinned the Clinton administration's desire to recalibrate the US BMD programme towards more manageable and less futuristic technologies. Technological problems also explain the administration's general reluctance to commit to deployment of a national missile defence system in the near-term. However, at the same time, the promise of new battlefield technologies such as THAAD and Patriot – particularly with regard to technologies needed for national missile defence – can partly explain the administration's desire to push ahead with these systems and secure an ABM Treaty demarcation agreement to allow for them.

All the same, technology cannot explain the change of tack performed by Clinton over BMD during this period. Nothing in 1996 suggested that near-term deployment of a credible and workable national missile defence system was an achievable goal. In fact, Theodore Postol,

[149] See NIE95-19, "Emerging missile threats to North America during the next 15 years" (November 1995)

Professor of Science, Technology and International Security at the Massachusetts Institute of Technology, would later argue that the 3+3 plan "was dead on arrival" and had "no chance of working right from the start".[150] Moreover, many questions continued to be raised about the capability and performance of far less demanding tactical missile defence systems upon which any larger system would be partly based. As such, it would appear that technology can say little about the decision to unveil a BMD deployment plan in 1996, other than that it was at best an unlikely endeavour. Consequently, neither developments in the international system nor the capabilities of technology can fully explain the particular evolution of policy during this period.

Domestic factors

To fully understand why policy evolved the way it did between 1993 and 1996 we must turn to the domestic realm, and in particular to the actions and thinking of President Clinton and the nature of the pressure brought to bear on policy by Congress. While to some extent policy evolved during this period within the larger strategic contexts provided and set by the international system and by technology, the particular rhythms of policy were essentially driven by the different ideas and conceptions of missile defence held by Clinton, and after 1994, by a Republican Congress. It would be the political interplay between domestic institutional factors that would cause Clinton's BMD thinking to fluctuate over this period, and that would account for the considerable differences in BMD policy between the first and second two years of Clinton's first term in office.

The actions and thinking of Bill Clinton were arguably the primary factor in understanding the particular evolution of policy during this period. Clinton's BMD thinking largely explains why the US BMD programme was scaled back and recalibrated during his first two years in office. Moreover, Clinton's determination to "depoliticise" missile defence and ensure that it not did become a hindrance to his wider policy priorities explains why by 1996 policy and the debate had

[150] Interview with Theodore Postol (2nd July 2010)

shifted. As such, Clinton's missile defence strategy was often underpinned by *domestic political reasons*. Nevertheless, to explain this transformation, and why Clinton was forced into this position, the examination of what happened must also consider the changes and pressures brought to bear on policy by Congress.

For the first two years of his presidency, Clinton was working with a like-minded Democratic controlled Congress that shared a similar view of BMD. As a result, he was able to pursue his BMD strategy relatively unhindered, which meant that policy was recalibrated, reduced and downgraded during 1993 and 1994, and more specifically, that the focus on SDI-type strategic defences was replaced with a new focus on theatre and tactical missile defences. However, the Republican take-over of Congress in late 1994 fundamentally altered this dynamic, and with the institutional balance now split along party political lines, the president and Congress became embroiled in a new political battle over BMD. The Republican leadership made missile defence a key priority, and set about forcing Clinton to make a commitment to NMD deployment, and to make BMD a US priority. Faced with a constant barrage of pressure from Congress, Clinton acted to depoliticise the issue by announcing his own 3+3 BMD deployment plan – a plan described by one commentator as "primarily a response to Republican pressure"[151] – allowing him to retain control of the direction of policy while also neutering the issue in the 1996 presidential campaign. It would be Congressional pressure – partly driven by perceived strategic necessity and partly by its value as a political weapon against the president – that would shape BMD policy during 1995 and 1996. Washington Post correspondence Bradley Graham would later comment that it "was clever how Republicans revived NMD and used it as an effective rallying point against President Clinton".[152]

BMD policy between 1993 and 1997 was therefore a reflection of *domestic political actors*, namely President Clinton and after 1994, the Republican controlled Congress, often acting for

[151] Interview with Theodore Postol (2nd July 2010)
[152] Interview with Bradley Graham (11th June 2010)

inherently *domestic political reasons*, whereby both presidential and Republican strategy was not necessarily always a reflection of their sincere beliefs about BMD. In the words of Lawrence Freedman:

> Clinton gave the impression that he hoped, as his Democrat predecessor, Lyndon Johnson, thirty years earlier had done, that authorizing an anti-ballistic missile programme would help defend him against a domestic Republican threat as much as defend the country from an external threat.[153]

Summary

To some extent, changes in the international system and technology explain the mounting pressure to develop battlefield and tactical missile defences during this period. However, international pressures do not credibly explain why the push for national missile defences gained momentum after 1994. Instead, it was the interplay of domestic political actors often acting for domestic political reasons that explain how and why policy evolved as it did. In this sense, it was the interaction between a president determined to reduce the role of BMD, but at the same time conscious of being labelled as weak on defence, and after 1994 a Republican controlled Congress eager to find a unifying issue with which to attack the president, that explains why the domestic political context played such a different role in 1993 and 1994 than it did in 1995 and 1996.

Conclusion

Bill Clinton tried hard during his first term to recalibrate, downsize and restructure the US missile defence programme towards what he perceived to be the very different requirements of the post-Cold War world. To some extent – especially during the first two years of his presidency – he achieved this, most notably by disbanding the Strategic Defense Initiative and reaffirming the ABM Treaty as the centrepiece of US-Russia relations and of international stability. Moreover, Clinton

[153] Freedman (2003) 430

successfully bolstered research and development on theatre and battlefield missile defences, building upon the consensus that had been established during George H. W. Bush's time in office. Although Clinton's initial restructuring and prioritisation of theatre missile defence appears roughly in sync with pressures from the international system and technology, neither systemic nor technological factors can explain what happened during 1995 and 1996 as Clinton appeared to change direction appreciably, and which would result in the announcement of a programme that appeared to have little strategic or technological rationale. To understand this requires an examination of the change in pressure brought to bear on policy by Congress.

Without question, the key development for BMD policy during this period was the Republican takeover of Congress in the 1994 mid-term elections. For a mixture of political and strategic reasons, the Republican leadership was determined to make missile defence a key national security issue in 1995 and 1996, and to some extent, they achieved this. Clinton's 3+3 plan was almost certainly driven by the perceived requirement to depoliticise the programme – particularly in an election year – and had arguably little to do with either strategic necessity or technological capability. As a result, policy was shaped by the competing interests of president and Congress, and by the domestic political battle between Democrats and Republicans and the Republican leadership and Clinton. In this way, the period 1993-1997 provides an example of how domestic political actors, often for primarily domestic political reasons, shaped BMD policy. Nevertheless, the fact that Clinton did not agree to deployment outright – by unveiling a hedging strategy rather than a specific commitment to deploy – suggests that the debate remained within the general confines set by technology and international strategic requirements.

As Bill Clinton ended his first term in office, the US ballistic missile defence programme appeared to be on the rise. Congressional pressure had forced Clinton into a position on missile defence driven partly by party political and domestic dynamics, and this ensured that BMD would remain at the centre of the policy debate in the future. That said the extent of this pressure would depend very much on which party won the 1996 mid-term Congressional elections, and on whether

Bob Dole or Bill Clinton would be president. What is more, by the end of 1996 it was still unclear as to what might be viably deployed in terms of BMD technology, and indeed, what such a deployment was supposed to be for. Above all, Clinton's change of direction during this period put the US on a direct collision course with the ABM Treaty, making a decision on this issue likely to be unavoidable over the next four years.

Party Politics and Republican Pressure for Deployment, (1997-2001)

Clinton began 1997 in much the same way as he had 1993, determined not let ballistic missile defence undermine his wider domestic and international policy agendas. Although the debate had moved forward – most notably thanks to the Republican takeover of Congress, and the president's 3+3 plan – Clinton was still in control of policy. Clinton remained unconvinced that neither the technical capability, or in the case of national defence, the military and strategic necessity, required anything different from what he was currently pursuing, although he would continue to fund and develop both tactical and national missile defence technologies during his second term. Moreover, and although Clinton would be confronted by a hostile Republican led Congress, Democrats in both Houses remained loyal to the president, and appeared to have little interest in an expanded BMD programme. As a result, it was assumed that Clinton would continue to prioritise his arms control agenda internationally, while at the same time developing a BMD capability in case it might be needed at some point in the future.

A combination of various different pressures would push the US and the Clinton administration into a greater acceptance of BMD during this period. In fact, this is one of the few phases looked at in this thesis where policy evolved roughly in sync with the developments in the international system. Both Clinton and the Democrats relaxed their opposition to BMD in 1998 following the North Korean missile test and the Rumsfeld Report, and both would become far more concerned about combating the apparently growing missile threat during 1999 and 2001. It was in this context that the 1999 Missile Defense Act was signed into law, and the Clinton administration strove to find a balance between BMD and the ABM Treaty. The result was that although Clinton did not make the final step towards deployment because of the diplomatic and technological issues

that the programme remained steeped in by 2000, the debate had moved appreciably closer towards acceptance of a national ballistic missile defence system.

This period raises a number of interesting questions. First, why did Clinton pursue a missile defence plan that appeared to be at odds with his wider policy agenda, and looked set to contravene the ABM Treaty? Second, why did Clinton, alongside Democrats in Congress, stand against deployment in 1997 and 1998, and then agree to it in principle in 1999? Finally, why did the politics of the missile defence deployment debate appear so out of sync with the technology needed to perform the tasks being outlined, especially in 1997 and 1998? In order to understand these questions it is important to look at the interplay between domestic, international and technological influences, and at how these combined to produce the complicated policy outcomes described above.

(1) Competing pressures on BMD policy, 1997-2001

As Clinton began his second term, relatively little had changed regarding technology or the international system since 1993, and any new threat from ballistic missile attack appeared to be distant and limited to battlefield and regional short-range missile proliferation. Moreover, even a rudimentary test of the components needed for the proposed 3+3 national missile defence system remained several years away. As such, and although the Republican leadership was determined to force the BMD issue during Clinton's second term, both the president and his Democratic allies in Congress remained resolutely committed to pursuing a cautious missile defence policy and to ensuring that the programme did not become a spoiler in the administration's international plans.

International pressures on policymaking

In 1997, international pressure on policymaking remained largely the same as during Clinton's first term, and the bilateral relationship with Russia continued to be the most important international factor shaping BMD thinking. However, as momentum gathered behind deployment in the US during this period, additional pressure was brought to bear on policy by American allies in Europe, and by the Chinese, both of whom were concerned about the implications of deployment. In addition to this, the growing concern about WMD proliferation and the need to respond to the mounting rogue state missile threat to the US, especially after 1998, created a second set of pressures on policymaking. Consequently, international pressure on the US BMD debate was bifurcated, and would often appear to provide contradictory pressures on policy.

The primary pressure on policymaking between 1997 and 2001 remained the residual strategic relationship with Russia and the centrality of the ABM Treaty to the possibility of stability and arms reductions. In particular, the relationship with Russia continued to dominate US international and missile defence thinking.[1] There were two reasons for this: first, Moscow remained suspicious of US BMD plans and concerned about the impact of missile defence on Russian security; second, and linked to this, Russian leaders continued to link further nuclear arms reductions with limits in US BMD plans.[2] However, this period would also see the beginning of a more vocal Chinese opposition to US BMD plans – often in accordance with Russia[3] – as Beijing

[1] Michael Krepon suggested that "… the strategic concept of MAD remained in place during the first decade after the demise of the Soviet Union more from force of habit than from official endorsement"…. "The Clinton administration had a desire to proceed with a Cold War conceptual framework, rather than to articulate a new strategic concept attuned to vastly different circumstances". Michael Krepon, "Cooperative threat reduction, missile defense and the nuclear future", (Basingstoke, Palgrave MacMillan: 2003) 5 & 36

[2] In addition to this, Russian leaders were becoming more concerned about NATO expansion, Russian economic problems, and US actions in Kosovo and Iraq during this period. See Wilkening (2000) 30.

[3] On 18th July 2000, a Chinese-Russian joint statement declared that "... the US programme to establish national missile defense, a system prohibited under the ABM Treaty, has aroused grave concern. China and Russia hold that this programme is, in essence, aimed at seeking unilateral military and security superiority. Such a programme, if implemented, will give rise to most serious negative consequences on the security of not only Russia, China and other countries, but the United States itself and global strategic stability as well. In this context, China and Russia have registered their unequivocal opposition to the above programme." See Jiang Zemin & Vladimir Putin, "Joint Statement by the Presidents of the People's Republic of China and the Russian Federation on Anti-Missile Defense, (18th July 2000).

became more concerned about the implications of US plans.[4] The growth in Russian and Chinese anxiety during this period would also lead to growing concerns from US allies, particularly in Europe. The reason for this was that many European leaders saw US missile defence plans – and especially ABM Treaty abrogation – as internationally destabilising, and the possible precursor to a new nuclear arms race.[5] In addition to this, many US allies did not consider that the level of missile threat warranted such moves, and therefore could not understand the developments in the US BMD debate.[6]

The second important international pressure on the debate during Clinton's second term was the growing rogue state missile threat, particularly from North Korea. The most significant international event during this period was Pyongyang's decision to test-fire a 3-stage rocket in August 1998, which took US policymakers – and especially the intelligence community – largely by surprise.[7] This event also served to compound a growing sense of insecurity that had been set in motion by Pakistani missile tests in April, Pakistani and Indian nuclear tests in May, and an Iranian missile test in July 1998.[8] Domestically, the influential 1998 "Rumsfeld Report"[9] and the 1999 National Intelligence Estimate[10] would further compound these developments by suggesting that the missile threat was growing far quicker than had been previously believed. The result was that international pressure began to shift from the strategic relationship with Russia, towards a far greater concern about ballistic missile proliferation to a new cohort of rogue states.

[4] For more on why China was becoming increasingly concerned about US BMD plans see Cordesman (2002) 94-115. As Cordesman points out, "From China's perspective, even a relatively limited US NMD program would seriously degrade current Chinese missile attack capabilities if China launched anything but its entire ICBM force in a single volley". (2002) 95

[5] For more on this see Bowen (2001)

[6] According to Bowen, "The Clinton Administration's preoccupation with missile defence as a domestic issue, and its pursuit of amendments to the ABM Treaty, led to a failure to initiate early top-level consultations with European allies to discuss the rationale behind, and potential implications of, NMD … this delay exacerbated anxieties". Bowen (2001) 490

[7] Graham (2003) 52-61

[8] Ibid 67

[9] See "Report of the commission to assess the ballistic missile threat to the United States", (15th July 1998)

[10] See "Foreign missile developments and the ballistic missile threat to the United States through 2015", *National Intelligence Council*, (September 1999)

According to Strobe Talbott, by 2000, the Clinton Administration was essentially faced with two competing international pressures; firstly, from Russia, China and allies in Europe, who for different reasons cautioned against any hasty move on BMD, and secondly from the growing WMD threat from rogue states.[11] Consequently, this period was characterised internationally by the growth in anti-BMD sentiment amongst US allies and Russia and an increase in the perceived missile threat from rogue states, and therefore by two often-competing pressures on the US missile defence debate.

Technological pressures on policymaking

In terms of technology, there was very little pressure to push ahead with ballistic missile defence deployment, especially of a national system, during this period. In fact, most independent scientific advice argued that at best, more time was needed for proper testing and development, and at worst, deployment remained a considerable technological challenge. Part of the reason for this was that by 2000, only three of the planned 17 tests of the Clinton administration's 3+3 proposal had been conducted, and only one of these could be considered as a success.

The overwhelming feeling amongst the US scientific and engineering community during this period was that a workable and effective national missile defence system remained many years, and many dollars away.[12] In fact, several members of the Clinton administration had expressed extreme doubt that the 3+3 plan was a technologically viable undertaking when it was unveiled in early 1996[13], and Undersecretary of Defense Paul Kaminsky had admitted that the 2006 deployment

[11] Talbott (2002) 379-389. Russian intransigence would intensify with the election of Vladimir Putin on 26th March 2000.
[12] In fact, even BMDO Director General Bill Nance declared in 1999 that "major challenges are ahead of us" and that "NMD remains a high risk program from both the technical and schedule perspective". Bill Nance, "An update on national missile defense", *Comparative Strategy*, 19 (1999) pp239-243: 242. A 1998 General Accounting Office report similarly warned that "even with increased funding, schedule and technical risks associated with a 2005 deployment remain high", (June 1998). See also Steven Young, *"Pushing the limits: the decision on national missile defense"*, (Coalition to reduce nuclear dangers, Council for a Livable World: July 2000).
[13] Interview with Bob Bell (6th March 2010)

date stipulated in the 3+3 plan would be very challenging, and that the system "might not work".[14] Moreover, evidence would surface throughout this period suggesting that the national missile defence plan was largely unworkable in its current guise, and General Larry Welch – who was asked to conduct an independent review into the NMD plan in 1998 – would notably argue that the programme was "rushing to failure".[15] To a lesser extent the same was true for the technologies required for tactical and battlefield missile defence systems, many of which – especially THAAD[16] – were based on similar technologies to the NMD system.[17] The Patriot Advanced Capability (PAC-3), however, had been successfully tested several times by 2000, and progress was being made on the Aegis sea-based system.[18]

A second important technological dynamic during this period was the emergence of evidence suggesting that some reporting of BMD development had been misleading. Foremost amongst these was the case of former TRW employee Nira Schwartz who alleged that unsuccessful testing had deliberately been covered up by the Pentagon to make the BMD programme appear more advanced than it was.[19] Perhaps more importantly, according to scientist Benn Tannenbaum, the result of this and other concerns about the programme was that the Pentagon would become much more secretive about BMD, which meant that independent science advice and analysis was made increasingly difficult.[20]

The combined effect of these technological pressures suggested that from a purely technological point of view, it was implausible that a national missile defence system deployment decision could be made as early as 2000, let alone that a functioning system could be deployed and working by the middle of the next decade. Consequently, technological pressure on the BMD

[14] Tim Weiner, "Star wars system remains many years and dollars away", *New York Times,* (18th May 1997)
[15] "Report of the panel on reducing risk in ballistic missile defense flight test programs", (27th February 1998)
[16] The Thaad system would fail six intercept tests between December 1995 and March 1999.
[17] For more on THAAD see "Missile defense: Thaad restructure addresses problems but limits early capability", *US General Accounting Office,* (GAO/NSIAD-99-142) (June 1999)
[18] Burns (2011) 66
[19] See William Broad, "Ex-employee says contractor faked results of missile tests", *New York Times,* (7th March 2000)
[20] Interview with Benn Tannenbaum (29th June 2010)

debate appeared to favour a "go-slow" approach that would postpone a deployment decision until further testing had been conducted.[21]

Presidential policy agenda

Clinton began his second term hoping that the 3+3 programme, combined with a plan to develop and deploy robust battlefield defences, would be sufficient to address the political and strategic threats that his administration would face between 1997 and 2001. The president hoped to occupy a middle ground on BMD; in the words of Brookings Institution scholar Michael O'Hanlon "adopting the right rhetoric and funding programmes, without any real chance of deployment".[22] As Clinton Administration official Strobe Talbott would later recall:

> We saw NMD as a research and development program that should be continued but that had a long way to go before it was ready for deployment … [and that for the time being] should remain within the bands of the ABM Treaty.[23]

Two dynamics in particular would shape the way that Clinton, and those around him, approached the issue of BMD during this period: (1) a desire to balance the requirements of a growing missile threat with international stability, and (2) an attempt to nullify Republican political pressure domestically.

Internationally, Clinton remained determined to place stability and strategic nuclear arms reductions with Russia at the centre of his policy agenda. For Clinton, this also meant continued adherence to the ABM Treaty - and the necessary acceptance of the limits on missile defence development and deployment that this entailed - as he believed this was the best means of creating a conducive environment for the arms control measures he wished to pursue.[24] However, at the same time, according to Walt Slocombe, "there were people in the Administration who were very

[21] John Isaacs, "Go slow: the people speak on missile defense", *Arms Control Today*, (January/ February 2000)
[22] Michael O'Hanlon, "Star Wars strikes back", *Foreign Affairs*, 78 (1999), pp68-82: 69
[23] Strobe Talbott, *"The Russia hand: a memoir of presidential diplomacy",* (New York, Random House: 2002) 379
[24] These included the Comprehensive Test Ban Treaty (CTBT) and the Non-proliferation Treaty (NPT) amongst other non-proliferation plans.

enthusiastic about missile defence, and others who although not theology opposed to BMD deployment".[25] Consequently, as Clinton and those around him became more aware that BMD might be required to play a role in combating future threats from rogue states, especially after 1998, opinion would remain split with the administration over how to move forward with the programme.[26] A direct reflection of this would be the difficult position that Clinton would find himself in by 1999 of balancing the threat from rogue states with the need for stability in relations with Russia and China.

The second dynamic shaping Clinton's BMD policy was his desire to chart a middle-way domestically. According to Michael O'Hanlon, the president was determined to keep BMD from becoming too politicised by placating the Republican leadership in Congress with moves towards BMD deployment, while at the same time making sure not to alienate his supporters and arms controllers in the Democratic Party.[27] In this respect, while Clinton realised that he "couldn't beat the BMD push with nothing", the programme remained shaped by the perceived domestic political requirements of the time.[28] One commentator suggested that at least part of Clinton's BMD thinking was driven by his decision to "co-opt" the BMD issue in a continuing hope of depoliticising it.[29] Towards the end of 2000, Clinton's thinking was also shaped by his desire to shield vice president and Democratic presidential nominee Al Gore from attacks on defence during the forthcoming presidential election.[30]

Clinton's BMD policy during this period was therefore inherently political, and this spread across both domestic and international policy realms. In both respects, Clinton's thinking was underpinned by a desire to balance competing priorities; internationally this was between

[25] Interview with Walt Slocombe (3rd August 2010)
[26] Interview with John Holum (27th July 2010)
[27] Michael O'Hanlon, "Star wars strikes back", *Foreign Affairs*, 78:6 (1999), pp68-82: 69. According to O'Hanlon, "Missile defense enthusiasts, most of them Republicans, want above all else to protect America from direct attack. Arms controllers, most of them Democrats, consider reducing and securing nuclear armouries and improving US-Russian relations to be paramount, and worry that deployment of NMD would seriously threaten those goals … President Clinton has wisely tried to apply his instincts for finding a 'third way' to resolve the controversy".
[28] Interview with Bob Bell (6th March 2010)
[29] O'Hanlon (1999) 78
[30] Tony Karon, "Bill Clinton: brave defender of the Aleutians", *TIME*, (23rd June 2000)

responding to the growing missile threat from rogue states and securing arms reductions and stability with Russia; and domestically it was between a Republican Party determined to force Clinton's hand on BMD and a Democratic Party equally keen to resist. In the words of one senior official, "Clinton remained very good at triangulating the BMD issue", and the result would be a complex compromise between these often-competing policy priorities.[31]

Congressional pressure on policymaking

Although bipartisan support for battlefield defences remained strong during this period, opinion on national missile defence was polarised in Congress between 1997 and 2001, with Democrats generally favouring restraint and Republicans generally keen to push ahead. As a result, with the Republican Party in control of both Houses, Congressional pressure on policy would largely be towards higher funding for BMD, and in the direction of pushing for early NMD deployment. However, up until 1998, the Democratic Party ensured that this pressure would not be overwhelming by containing most of the debate to within Congress, and by watering down much of the Republican legislation pushing for a greater commitment to BMD.[32]

During 1997 and 1998, Congressional pressure on policy was limited by the fierce partisan debates between Republicans and Democrats in Congress. Nevertheless, the Republican leadership pushed hard to pressure Clinton's BMD plans, and introduced four separate pieces of legislation into Congress calling for BMD deployment during these two years.[33] All of these Bills called for a US commitment to deploy a national missile defence system as soon as possible, and most of them implied that the US should either amend or leave the ABM Treaty.[34] In fact, one senior official later claimed that the "Republicans wanted to find something political to break the ABM Treaty so

[31] Confidential interview (B)
[32] Garrett (2005) 207-209
[33] See David Auerswald, "The president, the Congress and American missile defense policy", *Defence Studies*, 1:2 (2001), 57-82
[34] Ibid

they designed missile defence systems and legislation wording that would run into conflict with it".[35] At the same time, Democrats in Congress remained unconvinced about the necessity, desirability or feasibility of such a move, and therefore continued to stymie the push for an NMD commitment. In addition to this, Congress was locked in a heated debate during 1997 and 1998 about the composition of the "Commission to assess the ballistic missile threat" which Republicans hoped would bolster their case for NMD deployment.[36] The result of this was that much of the BMD debate during these years occurred within Congress, rather than between Congress and the president.

Although the 1998 mid-term elections altered the balance between Democrats and Republicans relatively little, Congress would exercise far more pressure on policy during 1999 and 2000. Fundamentally, this was because after 1998 the strategy and thinking of the Democratic Party changed. Specifically, Democratic lawmakers became more concerned about the threat of ballistic missile attack, but this change was also the product of what they perceived to be an alteration of strategy by the Clinton administration following the 1998 North Korean missile test.[37] Either way, the result was that both parties moved closer to an agreement on NMD deployment, although not necessarily anything that would contravene the ABM Treaty. Consequently, in the last two years of Clinton's presidency, as Democrats realised the futility of opposing missile defence outright, Congressional opinion shifted towards acceptance that NMD deployment some time in the future might be necessary. Nevertheless, Democrats remained committed to ensuring that anything that was deployed would be "technologically viable, strategically necessary and prudent".[38]

Congressional pressure on BMD policy was split during this period. For the first two years, Democrats and Republicans battled hard along party lines over policy, but this debate was largely confined to Congress. During the second two years, Democratic opposition to NMD deployment softened, which provided the opportunity for the Republican leadership to apply pressure on

[35] Confidential interview (E)
[36] Graham (2003) 34
[37] Confidential interview (B)
[38] Ibid

presidential policymaking, and allowed Congress to pass the 1999 Missile Defense Act. As a result, and while opinion over BMD would remain fundamentally party political, the contours of the debate shifted closer towards deployment during this period.

(2) The evolution of policy, 1997-2001

Although Clinton had reluctantly unveiled a commitment to national missile defence towards the end of his first term, at the beginning of 1997 the future shape of the US BMD effort remained uncertain. In part, this was because the American public appeared no more fearful of a ballistic missile attack in 1997 than they had done in 1993, but it was also because the types of technologies required for a credible defence were still largely in their infancy. Nevertheless, Republican control of Congress ensured that pressure for a US commitment to deploy a national missile defence system as soon as possible would remain at the forefront of policy during Clinton's second term.

1997 and 1998: The Republican BMD challenge continues

The Republican Party leadership began 1997 determined to continue their attack on the Clinton administration's BMD plans. The first component of this attack would involve the establishment of a high-level commission to reassess the judgments contained in NIE95, which many Republican lawmakers viewed as being too soft. The Commission, which would share stark similarities with the "Team B" exercise undertaken in the late 1970s[39], would be chaired by Donald Rumsfeld, and would seek to provide an alternative view on the ballistic missile threat that the US might face in the near future. Leading Republicans hoped that the Rumsfeld Report might be used to facilitate

[39] Team B exercise was conducted by the CIA in the 1970s to analyse the threat posed to the security of the United States by the Soviet Union. The Team B reports became the intellectual foundation for the idea of the window of vulnerability and of the massive arms buildup that began toward the end of the Carter administration and accelerated under President Ronald Reagan. For more on this see Anne Hessing Cahn, *"Killing détente: the right attacks the CIA"*, (Pennsylvania, Pennsylvania State University Press: 1998).

the case for deployment and attack what they continued to perceive as the cautious approach to BMD being taken by the Clinton administration.[40]

The second component of the Republican attack would be direct legislation pushing for BMD deployment. After the failure of the "Defend America Act" of 1996, the primary objective of the Republican leadership remained to force a deployment decision on NMD to respond to a threat that they maintained was closer and far more dangerous than the administration, and Democrats in Congress, asserted. To this end, two separate NMD Bills were introduced into Congress in early 1997. The first, sponsored by Senator Trent Lott (R-MS), entitled the "National Missile Defense Act of 1997", mandated deployment of a national missile defence system able to protect all 50 states from limited accidental, unauthorised or deliberate missile launches by 2003. It also proposed that the Clinton administration should begin negotiations with Russia immediately to amend the ABM Treaty to allow for this, and if this hadn't succeeded within one year, that the US should announce its attention to abrogate the Treaty.[41] The second Bill, introduced by Senator Richard Lugar (R-IN) was an attempt at finding a middle ground compromise that would pass Congress and be acceptable to the Clinton administration. The "Defend the United States of America Act of 1997" called for the US to develop a national missile defence system that was capable of being deployed by 2003, but that would be subject to a Congressional vote in 2000 to decide whether or not to begin deployment based on threat, cost, implications for arms control, and US preparedness. Moreover, and whereas Lott's Bill would push Clinton to negotiate and possibly abrogate the ABM Treaty, Lugar suggested that the ABM Treaty should have "sufficient flexibility to accommodate new US BMD plans".[42]

However, these efforts would be neutered by Democrats in Congress who continued to view the legislation as "unnecessary, unworkable, wasteful and a threat to the nuclear arms control

[40] See Maria Ryan, "Filling in the 'unknowns': hypothesis based intelligence and the Rumsfeld commission", *Intelligence and National Security*, 21:2 (2006), pp286-315
[41] Auerswald (2001) 69
[42] Quoted in Craig Cerniello, "NMD debate in Congress heats up as Lott, Lugar introduce new bills", *Arms Control Today*, (January 1997)

regime".[43] As a result, neither Bill introduced into Congress was successful; Lott's legislation was unable to overcome a Democratic filibuster in the Senate, while Lugar's did not pass the Armed Services Committee.[44] In addition to this, budget conscious Congressman from both parties remained wary of; (1) the spiralling costs outlined by the Congressional Budget Office, (2) the immaturity of the technology, and (3) the fact that according to opinion polls the American national media paid less attention to the need for a national missile defence system in 1997 than at any point since the Republican Party began the battle for NMD in 1994.[45]

At the same time, Clinton began his second term keen to reach an agreement with Russia on the ABM Treaty in order to permit his preferred range of non-strategic missile defences, which he continued to view as the necessary and adequate response to the current and near future international threat. In September 1997, as part of a wider move towards a possible START III Treaty, Clinton and Boris Yeltsin agreed upon a set of demarcation statements formally codifying what was and wasn't permitted by the ABM Treaty.[46] In addition to this, the two leaders issued a joint statement declaring their determination to "preserve the ABM Treaty, prevent circumvention of it, and enhance its viability", as well as reaffirming the joint belief that the Treaty continued to represent the "cornerstone of strategic stability".[47] This agreement was designed as the springboard for negotiations on a START III Treaty, which would potentially reduce nuclear stockpiles to between 2000 and 2500 warheads each.[48] Clinton hoped that by publicly declaring US support for the ABM Treaty, he would be able to create the conditions to pursue his wider international agenda, in particular, the CTBT. David Smith argued that the accord was "little [about] demarcation, [but]

[43] Auerswald (2001) 69
[44] Ibid; Powaski (2003) 193
[45] Musgrave (2003) 31
[46] It was agreed that missile defence systems would be permitted under the Treaty as long as the velocity of the target missile did not exceed 5kmp/s or have a range in excess of 3500km, and that both parties would not develop, deploy or test space-based TMD systems. See "Joint statement on the Anti-Ballistic Missile Treaty", The White House, Helsinki, Finland, (21st March 1997)
[47] Ibid
[48] Congress had ratified START II in January 1996, but the Russian Duma continued to link ratification of the Treaty to other contentious issues in US-Russian relations such as NATO expansion, the ABM Treaty and the Balkans. For more see Goldgeier & McFaul (2003) 293

really an agreement about strengthening the ABM Treaty" in order to foster a new round of arms reductions.[49]

In the end, Clinton did not submit the demarcation agreements to the Senate for fear that the Republican majority would reject them. House Leader Newt Gingrich (R-GA) had made it clear that Congressional Republicans would oppose Clinton's ABM Treaty demarcation agreements with Russia because they would "halt the development of the most effective possible ballistic missile defense" and would "place the lives of millions in jeopardy".[50] Nevertheless, the Pentagon was now able to move ahead with the development and deployment of several promising TMD systems.

The Republican Party continued to push for NMD deployment in 1998, and in March Senator Thad Cochran (R-MS) introduced the "American Missile Protection Act of 1998" into the Senate, which proposed that the US should "deploy as soon as technologically possible an effective NMD".[51] Unlike the previous year, Cochran's Bill made no mention of the ABM Treaty and did not instruct the Pentagon to pursue a particular architecture, instead choosing to focus on the threat rather than the system or the ABM Treaty.[52] However, the Bill was defeated in May by a Democratic filibuster, as Democrats remained reluctant to pursue a policy that seemed unnecessary given; (1) the level of threat, (2) the maturity of technology and the likely ramifications of such a move for the ABM Treaty, and (3) the impact on relations with Russia, nuclear disarmament and overall international stability.[53] In addition to this, Democrats remained confident that such a move did not appear to reflect either developments in or requirements of the international system. In spring 1998

[49] David Smith, "Missile defense after Helsinki", *Comparative Strategy,* 16 (1997), pp369-376: 375; Erlanger (25th March 1997)
[50] Powaski (2003) 181-2
[51] Auerswald (2001) 69
[52] Ibid
[53] Powaski (2003) 195

for example, the Joint Chiefs of Staff announced that they continued to expect that the US would have plenty of warning before any new missile threat emerged, probably around three years.[54]

A second reason why the legislation failed was because missile defence technology, but NMD technology in particular, was struggling to keep pace with political developments. In order to meet the 2000 date for a deployment decision mandated by Clinton in 1996, the BMDO had been forced to bypass many of the normal developmental procedures and rush the testing of several components that otherwise would have taken much longer to develop.[55] The first warning of the problems with this approach came in February 1998 as a panel established to look into the flight-testing programme being conducted by the BMDO, led by retired Air Force General Larry Welch, found that: "The perceived urgency of the need for these systems has led to high levels of risk that have resulted in delayed deployments because of failures in the development test program".[56] Welch also suggested that planning for NMD testing had been "over optimistic" and that consequently the entire US BMD programme was "rushing to failure".[57] A subsequent report from the GAO also cast doubt on the programme, commenting that "even with increased funding, schedule and technical risks associated with a 2003 deployment remain high."[58] These concerns were echoed by Undersecretary of Defense Paul Kaminski, when he later admitted that a 2006 deployment date would be very challenging, and even then, that the system "might not work".[59] In general, Pentagon officials believed that a workable system remained "many years and many billions of dollars away".[60]

Although these technological shortcomings were partly the result of the political schedule driving the NMD plan, and a direct product of the programme's lack of funding and general neglect by the Clinton administration, it also undermined the case for those pressuring for a near-term

[54] Bradley Graham, "A bumpy path for missile defenses", *The Washington Post,* (27th April 1998)
[55] John Deutch, Harold Brown & John White, "National missile defense: is there another way?", *Foreign Policy,* 119 (2000), pp91-100: 93-5
[56] "Report of the Panel on Reducing Risk in Ballistic Missile Defense Flight Test Programs", (27th February 1998)
[57] Ibid
[58] "National missile defense: even with increased funding technical and schedule risks are high", *US General Accounting Office,* (June 1998)
[59] Weiner (18th May 1997)
[60] Ibid

deployment decision. Fundamentally, it convinced many lawmakers that it would be imprudent to begin a deployment programme before either the technology had been proven to work, or before the threat had actually materialised, because such a move would likely make any system strategically obsolete when it came to be deployed. Anthony Cordesman warned that "politicizing a program and creating artificial deadlines do not help make it successful".[61]

In July 1998, the findings from the "Commission to assess the ballistic missile threat", which had been mandated by the Republican leadership in 1996 to challenge the 1995 National Intelligence Estimate, were released. Most notably, relating specifically to North Korea, Iran and Iraq, the commissioners found that:

> The threat to the US posed by these emerging capabilities is broader, more mature and evolving more rapidly than has been reported in estimates and reports by the intelligence community.[62]

Moreover, the commissioners also claimed that "the intelligence communities' ability to provide timely and accurate estimates of ballistic missile threats to the US is eroding" and that "the warning times the US can expect of new, threatening ballistic missile deployments are being reduced", consequently, "the US might have little or no warning before operational deployment".[63] The Staff Director of the Commission, Stephen Cambone, suggested that the conclusions reflected the general feeling amongst the commissioners that the "CIA had not covered itself with glory", particularly regarding ABM Treaty compliance issues, and that the Agency had a tendency to understand circumstances as being less threatening than others might understand it to be.[64]

[61] Anthony Cordesman, *"Strategic threats and national missile defenses",* (London, Praeger Publishers: 2002) 318
[62] Executive Summery of the "Report of the commission to assess the ballistic missile threat to the United States" (The Rumsfeld Report), (15th July 1998)
[63] Ibid
[64] Interview with Stephen Cambone (5th August 2010)

The Commission was split between Democratic and Republican appointees (5 Republican, 3 Democratic)[65], and had been deliberately set up to ensure that any recommendations had bipartisan support.[66] The Commissioners were also instructed to look at the "missile threat" problem in a different way to the CIA. According to Stephen Cambone, whereas the Agency tended to start with intentions and try to understand technology, the commissioners would begin by looking at what was known about technology and from there try to extrapolate what they thought the technology was capable of doing or evolving into. In addition to this, it was also agreed that the issue of BMD would not be directly addressed, which according to Cambone, "liberated the Commission to do the work it needed to do", and allowed them to have "open and earnest conversations".[67] By looking at the problem in this manner, the Commission came to very different conclusions to those of the CIA.[68] Of equal importance, the unanimity of the Commissioner's findings ensured that these conclusions would carry significant weight in policy circles.[69] Newt Gingrich (R-GA) described the 1998 Rumsfeld Report as "the most important warning about our security since the end of the Cold War", and missile defence advocates in Congress immediately jumped on the report as vindication of their policy, and to criticise President Clinton.[70]

On 21st August 1998, the Report's findings were bolstered by news that North Korea had unexpectedly tested a three-stage rocket; a development far beyond what the US had until then believed Pyongyang was capable of. The launch highlighted the fact that the intelligence community could not be certain to have as much warning about missile developments as it had suggested in NIE95, which in turn gave added weight to the conclusions contained in the Rumsfeld Report.[71] The North Korean test compounded a growing sense of insecurity throughout 1998, which had begun in April when Pakistan had tested its Ghari ICBM; increased as Pakistan and India

[65] Dr William Graham, Dr William Schneider, General Larry Welch, Dr Paul Wolfowitz, James Woolsey; and Dr Barry Blechman, General Lee Butler and Dr Richard Garwin. For more on the members of the Commission see Ryan (2006) 296-298
[66] Interview with Stephen Cambone (5th August 2010)
[67] Ibid
[68] Ibid
[69] Ryan (2006) 298
[70] Graham (2003) 48
[71] Ibid 52-61

conducted underground nuclear tests in May, and was bolstered in July as Iran flight-tested its Shahab-3 ballistic missile.[72] Nevertheless, a few days later, Chairman of the JCS Hugh Shelton (1997–2001) argued that the US would have "ample warning of any attempt by rogue nations to develop ballistic missiles, let alone threaten the US with them".[73]

Although the Report made Congressional Democrats anxious about their continued ability to coordinate voting against Republican efforts to legislate an accelerated timetable for a more robust NMD deployment, the Democratic leadership in the Senate remained confident that they could stymie the latest push for BMD, and hotly contested the findings contained in the Report.[74] As a result, the Democrats successfully filibustered Trent Lott's second attempt to introduce NMD legislation into the Senate in September 1998, because according to one Congressman "it was based on antiquated technology and would undermine international weapons treaties".[75] After defeating the Bill, Senator Kent Conrad (D-ND) reflected the views of many when he argued: "lets make sure we deploy the best initial system not just the first one off the shelf", while Carl Levin (D-MI) warned that: "this will weaken and jeopardize our national security".[76] The feeling that the president's NMD plan was currently sufficient was backed up during the 1998 mid-term Congressional elections, as several Republican Senate candidates tried unsuccessfully to make the administration's approach to BMD an election issue.[77] Nevertheless, Senate Republicans were just one vote short of invoking the Bill through cloture (59-41), and Congress did vote to appropriate $1.5b for NMD for the fiscal year of 1999, a $600m increase in the Clinton administration's request.[78]

[72] Ibid (2003) 67
[73] Quoted in Clark (2000) 211
[74] Greg Theilman, "The 1999 Missile Defense Act", *Arms Control Today,* (July/ August 2009); Graham (2003) 48
[75] Quoted in Eric Schmitt, "Republican missile defense bill loses by one vote in Congress", *New York Times,* (10th September 1998)
[76] Ibid
[77] Isaacs (Jan/ Feb 2000)
[78] Auerswald (2001) 70

1999: The Missile Defense Act

The events of 1998 had a profound impact on the Clinton administration. National Security Aide Bob Bell described the North Korean missile test of 1998 as "a game changer", as it both forced the Clinton administration to consider the issue of NMD far more seriously, and fundamentally undermined Democratic opposition to the programme in Congress.[79] Undersecretary of State for Arms Control and International Security John Holum, would later remark that the North Korean missile test was "well beyond what we had up until then thought was their capability", and it caused many within the administration – including himself - to change their thinking on BMD.[80] Nevertheless, the national missile defence programme continued to be beset by technological challenges, and in mid 1999 Brigadier General Willie Nance, NMD programme manager at the BMDO, declared that "major challenges" remained for the NMD system, and that the 2005 deployment schedule remained "extremely demanding".[81] A few months later, General Larry Welch would again warn about moving too quickly, and suggested that the Deployment Readiness Review (DRR) should be treated more as more a "feasibility decision with some long term deployment actions rather than a readiness decision".[82] Consequently, and although Clinton was still not convinced about the technology required to build a national missile defence system, he realised that the programme needed to be taken more seriously, especially given the commitment he had made to make a decision on deployment in 2000 under the 3+3 plan.[83]

With this in mind, the administration held a series of high-level meetings about how the BMD programme could be altered to provide a credible and workable deployment option by 2000. It was decided that in light of the technological difficulties being experienced that more time would be required to develop a workable system, and that a new deployment plan was needed. When Secretary of Defense William Cohen announced the revised plan in mid-January 1999, he declared

[79] Interview with Robert Bell (6th March 2010)
[80] Interview with John Holum (27th July 2010)
[81] Bill Nance, "An update on national missile defense", *Comparative Strategy*, 18:3 (1999), pp239-243: 242
[82] Stephen Young, *"Pushing the limits: the decision on national missile defence",* (Washington DC, Coalition to Reduce Nuclear Dangers, Council for a Livable World: 2000) 11
[83] Graham (2003) 67

that the earliest possible deployment date for the NMD system would be pushed back two years to 2005.[84] As part of this revised plan, the administration asked Congress for $6.6b in funds for NMD deployment between fiscal years 2000-2005, and at the same time agreed to begin examining the nature and scope of possible ABM Treaty amendments with the Russians to allow for the deployment of a system in the future.[85]

In a press conference that accompanied the announcement of the revised NMD deployment plan, Secretary of Defense Cohen made it clear that the administration accepted that the long-range missile threat was real and growing. Cohen also suggested that the ABM Treaty should be modified to allow for deployment, and that if it could not be amended then "we have the option of simply pulling out".[86] This appeared to mark a significant change of strategy by the administration on the ABM Treaty – which until now had seemed sacrosanct – and caused Clinton to order Senior NSC Official Robert Bell to conduct a press conference the next day to "clarify" what Cohen had meant.[87] While accepting that there had been acceleration over the last six months in the ballistic missile programmes of rogue states, Bell announced that:

> The ABM Treaty remains, in the view of this administration, a cornerstone of strategic stability, and the US is committed to continued efforts to strengthen the Treaty and enhance its viability and effectiveness.[88]

In a further effort to clarify the administration's position, National Security Advisor Sandy Berger threatened a presidential veto in response to any future NMD Bill that looked set to contravene the ABM Treaty, and the administration reiterated its commitment to make a decision in 2000 based on four criteria; cost, threat, technology and the impact on arms control.[89]

[84] Craig Cerniello, "Cohen announces NMD restructuring, funding boost", *Arms Control Today*, (Jan/Feb 1999)
[85] Ibid
[86] Ibid
[87] Ibid
[88] Graham (2003) 98-100
[89] Auerswald (2001) 75

While Democrats in Congress had also been surprised by the events of 1998, the party leadership might have continued trying to filibuster legislation had it not been for the perceived change in stance of the Clinton administration. Consequently, when the Republican Party again introduced legislation calling for national missile defence deployment in early 1999, leading Democrats realised that they would be unable to sustain another filibuster in the Senate, and because they did not feel confident that they could block the legislation, set about trying to revise it.[90] At the same time, the Republican Party leadership also appeared more inclined to compromise in order to get their legislation passed. As a result, the legislation introduced into Congress in early 1999 did not demand that the ABM Treaty be abrogated, and Senator Thad Cochran (R-MS) suggested that the Bill include an amendment making NMD deployment funds subject to the annual authorisation and appropriations process.[91]

Nevertheless, Democrats only agreed to vote for the Bill once it included a second amendment, proposed by Senator Mary Landrau (D-LA), which stated that it would remain the "policy of the United States to seek continued negotiated reductions in Russian nuclear forces".[92] With both parties believing that they had got what they wanted from the Bill; the Republicans were pleased that NMD legislation had finally passed Congress, while the Democrats believed that they had comprehensively disarmed the Bill by the inclusion of the two amendments, the legislation passed in late May.[93] In doing this, the NMD Bill had been amended enough for it to gain Clinton's tacit approval, primarily because the two amendments made by the Senate; (1) to keep deployment subject to annual appropriations, and (2) by linking any deployments with continuing arms control policy. As such, Clinton felt that signing the Bill did not constitute a deployment decision.[94] After

[90] Confidential interview (B)
[91] Graham (2003) 101
[92] Auerswald (2001) 73-4
[93] Craig Cerniello, "NMD bill clears Congress as Senate re-examines ABM Treaty", *Arms Control Today,* (April/ May 1999)
[94] Confidential interview (E). In fact, one senior official later commented that "the 1999 Missile Defense Act was sufficiently vacuous that it should simply have been accepted".

the House had agreed to amend the Bill so that it contained the same provisions as the Senate version, it was sent to Clinton who signed it into law in June 1999.[95]

When it came to signing the Bill, Clinton made it very clear that he did not view the legislation as representing a clear and definite decision on deployment, stating:

> By specifying that any NMD deployment decision must be subject to the authorization and appropriations process, the legislation makes it clear that no decision on deployment has been made.[96]

Moreover he argued: "by continuing to support negotiated reductions in strategic nuclear arms, the Bill reaffirms that our missile defense policy must take into account arms control objectives".[97] And that:

> Section 3 [of the bill] puts Congress on record as continuing to support negotiated reductions in strategic nuclear arms, affirming my administration's position that our missile defense policy must take into account our arms control and non-proliferation objectives.[98]

As a result, Clinton was able to maintain control of the NMD programme and reaffirm that any missile defence system that the US decided to deploy would have to meet his original criteria on threat, cost, technology, and arms control. House majority leader Dick Armey (R-TX) declared: "once again, the president's agility with language is making it difficult to do the nation's business".[99] While Michael O'Hanlon described the 1999 Missile Defense Act as "a deep disagreement masquerading as an agreement".[100]

Despite believing that the Missile Defense Act did not represent a decision to deploy, as Clinton signed the Act in July 1999, major decisions regarding the specific components and architecture of the proposed US NMD system had not been made. Most importantly, the final design for the system had not been decided, and much of the testing had not even begun. As a result, and because

[95] "Clinton Statement on National Missile Defense Legislation", *US Newswire,* (17th March 1999)
[96] Ibid
[97] Ibid
[98] "Clinton Statement on National Missile Defense", *US Newswire*, (23rd June 1999)
[99] Clark (2000) 214
[100] O'Hanlon (1999) 79

Clinton had tried to balance politics, diplomacy and security between 1994 and 1999, the administration found itself "boxed into a corner" by mid 1999; caught between trying to make a credible deployment decision and not undermining the ABM Treaty.[101] Moreover, because NMD deployment was never really a serious policy for the Clinton administration – at least until 1998 - little thought had been put into exactly what type of architecture might be needed and what would be required diplomatically to allow for this. Consequently, it was only in August 1999 that Clinton and his national security team agreed a three-part plan to proceed with NMD and make the ABM Treaty more relevant, while also continuing to push for cuts in nuclear weapons with Russia.[102] The new NMD plan called for 20 interceptors in Alaska by 2005, rising to 100 during 2006 to combat the threat from North Korea, with the possibility of a combined second and third phase of an additional 100 interceptors at a separate site (probably North Dakota) by 2010 to counter possible future threats from the Middle East.[103] Professor John Steinbruner, Director of the Center for International and Security Studies at the University of Maryland, argued that the schedule must "have been inspired by domestic politics, since it made no sense in technical or strategic terms".[104]

The shift in the domestic BMD debate was also reflected in the views of the US intelligence community, as the 1999 National Intelligence Estimate revised its earlier judgements and declared: "during the next 15 years the US most likely will face ICBM threats from Russia, China and North Korea, probably Iran, and possibly Iraq".[105] Although Joseph Cirincione argued that the NIE was based upon a "lowering of previously established standards for judging threats", rather than a substantial increase in the ballistic missile threat, the estimate represented the changing dynamics of the missile defence debate.[106]

[101] Michael Gordon & Steven Lee Myers, "The nuclear shield: looking for cover; politics mixes with strategy in plan for anti-missile system", *New York Times,* (23rd June 2000)
[102] Talbott (2002) 382
[103] Wilkening (2000) 32; Walter Slocombe, "The administration's approach", *Washington Quarterly,* 23:3 (2000) pp79-85: 80
[104] John Steinbruner, "National missile defense: collision in progress", *Arms Control Today,* (November 1999)
[105] "Foreign missile developments and the ballistic missile threat to the United States through 2015", (September1999)
[106] Cirincione (2000) 125-6

Even though the events of 1998 fundamentally changed thinking about the ballistic missile threat inside the Clinton administration, the president remained determined not to let NMD interfere with his wider policy agenda. Clinton signed the 1999 Missile Defense Act because he believed that the provisions it contained would allow him to continue to control policy and defuse any political value that Republicans might attach to it, and not strictly because he saw the need or feasibility of near-term deployment. The Missile Defense Act had been driven primarily by the change in the perception of threat during the second half of 1998, which in turn caused the Clinton administration to rethink its NMD plans, and which caused the resistance of Congressional Democrats to weaken. But it had also been driven by politics, particularly by the president's realisation that the ballistic missile threat was real and growing, and by his move to depoliticise it, and by doing so ensure that he retained control of the policy.[107]

2000: The decision to defer deployment

In September 1999, the Clinton administration announced that for strategic reasons (namely the ability to cover the entire country, including Hawaii, against missile attack from North Korea) the NMD site would have to be in Alaska, and this created a number of substantial problems.[108] The first of which was that an Alaska deployment as opposed to one based in North Dakota would require changes or amendments to the ABM Treaty; the second problem was that Clinton had given himself barely a year in which to negotiate these changes. The key to any deal seemed to be linking the amendments to a new START III Treaty, which the Russians were keen to pursue, but this also contained its problems: (1) firstly the Pentagon strongly resisted any proposals that would involve reducing US nuclear weapons down to less than 1500 warheads, the minimum they argued that was

[107] Bradley Graham suggested that it was also because "The Clinton administration had started down a slippery new policy slope, pushed partly by the Republican controlled Congress, but also pulled by its own alarmist reading of North Korea's missile program". (2003) 98
[108] Cordesman (2002) 15

required to maintain a credible three-part nuclear deterrent;[109] (2) secondly the upcoming elections in both Russia and the US meant that any decision would have to be reached in a short period of time.

With this in mind, in late 1999, the Clinton administration embarked on a programme of trying to modify the ABM Treaty to allow for NMD, while attempting to preserve the Treaty as a key component of strategic stability for the future.[110] This plan however brought with it its own set of problems; namely how to push ahead without disrupting international stability. The Russians did not seem keen on amendments, especially following the election of Vladimir Putin in May 2000, and in November, the Russian delegation to the UN General Assembly sponsored a successful resolution opposing any missile defence system that violated the ABM Treaty.[111] In the words of Deputy Secretary of State Strobe Talbott:

> Like Sandy [Berger], I believed the trifecta was a long shot, probably coming too late in the Clinton presidency to be achievable either diplomatically or politically. It was worth trying for but not betting the ranch on. We should make an all-out effort at getting a deal while leaving the president a range of choices about what to do if the Russian's refused".[112]

All the same, on 19th January 2000 US officials presented their Russian counterparts with the proposed set of changes to the ABM Treaty. The centrepiece of these proposals was to change the single site permitted by the Treaty from North Dakota to Alaska.[113]

In April 2000, the Russian Duma ratified START II and the ABM Treaty demarcation agreements signed in 1997, but linked these decisions to continued US adherence to the ABM Treaty. Vladimir Putin told Clinton that Russia would "tear up" START II if the US abrogated the ABM Treaty, which consequently made any likelihood of an agreement on NMD virtually impossible.[114] On the 5th July 2000 Putin and Chinese President Jiang Zemin issued a joint announcement stating that the deployment of national missile defence "will signify the undermining

[109] Goldgeier & McFaul (2003) 298
[110] Slocombe (2000) 85
[111] Burns & Brune (2003) 169
[112] Ibid
[113] Ibid
[114] Alexander Pikayev, "Moscow's matrix", *The Washington Quarterly,* 23:3 (2000), pp187-194: 187; Talbott (2002) 389

of the global balance" and therefore "that the ABM Treaty should not be altered".[115] On the same day, General Vladimir Yakovlev Commander of the Russian Strategic Rocket Forces announced that Russia "might increase the number of warheads on the Topol-M ICBM or might build more medium range nuclear capable missiles".[116] Putin and Zemin also criticised the US for trying to "secure unilateral advantage" in a move that would have, "serious negative consequences" and which might "reignite the arms race".[117] Professor Dean Wilkening, of the Center for International Security and Cooperation, warned that:

> Any unilateral withdrawal would probably cause the end of US-Russian strategic nuclear force reductions, and would cause China to react by modernising its strategic nuclear forces, with possible knock-on effects to India, Pakistan and others.[118]

The new US push for BMD was equally badly received by US allies, particularly in Europe, where one of the main problems was that the Europeans, much like the Russians and the Chinese, didn't think that the current level of missile threat justified the response that the US was pursuing.[119]

After an aborted practice test, the first trial of the national missile defence system was conducted on 1st October 1999, less than 12 months before the deployment decision would be made, and although regarded as a success, soon became marred in controversy as it later emerged that a bright decoy had been included with the warhead to help guide the kill vehicle to its target.[120] The second test of the system, carried out on 18th January 2000, failed after the kill vehicle did not separate from the booster missile. Consequently, with one (scripted) success, and one failure, much would depend upon the third and final test scheduled for the summer.[121] According to Strobe Talbott, the test failures also represented a significant "setback for diplomacy", as technological credibility would

[115] Quoted in Cordesman (2002) 79-83
[116] Ibid
[117] Ibid
[118] Wilkening (2000) 29
[119] Bowen (2001) 491; Colin Gray, "European views of US ballistic missile defense", *Comparative Strategy,* 21 (2002), pp279-310
[120] Kerry Gildea, "NMD test proceeded despite software problems in target", *Aerospace Daily*, (8th October 1999)
[121] Graham (2003) 187-90 & 199-200

undoubtedly make negotiating ABM Treaty amendments much harder if the Russians remained unconvinced that such a system could work.[122]

Concern about the programme was compounded in June after another report from General Larry Welch suggested that although improvements had been made, the NMD schedule continued to cause a "very high risk".[123] The third test of the system, conducted in July 2000, was also unsuccessful as the kill vehicle again failed to separate from the booster rocket.[124] In addition to this, the Pentagon's internal investigation into whether NMD technology was sufficiently advanced to warrant deployment suggested that:

> Given the immaturity of ground testing, the delays in ground test capabilities; the limitations of flight-testing and the inadequacy of available simulations, a rigorous assessment of potential system performance cannot be made.[125]

As a result, the Report felt strongly enough to argue that: "the system has not demonstrated an integrated capability… [Or] an ability to defend all 50 states satisfactorily".[126]

The immaturity of NMD technology was a key reason behind Clinton's decision to postpone deployment. Undersecretary of Defense for Policy Walt Slocombe – a supporter of BMD within the administration – would later quip that the programme "was not a technological success to put it mildly."[127] It was also indirectly a key reason for the decline of bipartisan support for the system in Congress, and why negotiations with the Russians over the ABM Treaty became increasingly complicated. With only three tests of the NMD system having been carried out by the time Clinton made his decision, the president simply didn't believe the evidence existed to push ahead with deploying an untested and unproven national missile defence.

[122] Talbott (2002) 385
[123] "National Missile Defense Independent Review Team, Executive Summary", (13th June 2000)
[124] Susannah Meadows, "An embarrassing star wars flop", *Newsweek,* (17th July 2000)
[125] Director Operational Test and Evaluation Report in Support of National Missile Defense Deployment Readiness Review", (10th August 2000)
[126] Ibid
[127] Interview with Walt Slocombe (3rd August 2010)

While the successful NMD test in October 1999 had intensified support for a national missile defence deployment, in the wake of the second, but particularly the third test failures, pressure from Congress, and Democratic acquiescence with the NMD plan, gradually fell away.[128] This would be replaced by a strong feeling that deployment should be postponed until after the forthcoming election.[129] Moreover, Republicans could no longer accuse the administration of deliberately ignoring the programme, and could do little until Clinton announced his decision in late summer 2000, or until a third test of the system had been conducted. Nevertheless, significant support remained amongst NMD enthusiasts in the Republican Party, and in April 2000, 25 prominent members sent Clinton a letter outlining their complete opposition to ABM Treaty amendments, suggesting that without a change of approach any agreements would not be ratified in the Senate.[130] The resolve of these lawmakers was underlined on 13th October 1999 as the Senate failed to ratify the CTBT, the first security related treaty in 80 years that the Senate had rejected.[131] According to Stephen Cambone, in this context, the defeat of the CTBT was "politically important," as it demonstrated the antagonistic nature of the Republican controlled Congress to Clinton's arms control agenda.[132]

In addition to the problems with technology, international developments throughout 1999 and 2000 reduced the feeling that the missile threat to the US was imminent and growing. In August 1999, for example, proposals with North Korea about suspending its ballistic missile programme began, and in September, an agreement was reached whereby Pyongyang would halt its missile tests while discussions were underway with the US.[133] Additionally, in early 2000, the State Department relabelled both North and Iran as merely "states of concern".[134] As a result, the 2005

[128] Graham (2003) 323
[129] Steven Lee Myers, "Clinton seeks to avoid acting in missile defense system", *New York Times,* (21st June 2000)
[130] Elizabeth Becker & Eric Schmitt, "GOP Senators tell Clinton they oppose him on ABM Treaty and defense system", *New York Times,* (22nd April 2000)
[131] However, the US Senate didn't formally ratify SALT II after President Jimmy Carter submitted it for advice and consent for ratification in June 1979. For more on this see Strobe Talbott, *"Endgame: the inside story of SALT II",* (London: Harper Collins: 1980)
[132] Interview with Stephen Cambone (5th August 2010)
[133] Burns & Brune (2003) 164
[134] Ivo Daalder, "The domestic politics of national missile defense", *Netherlands Press Association,* (10th July 2000)

deployment date began to look more arbitrary and unnecessary, and political pressure for immediate deployment began to cool.

Clinton chose not to push ahead with NMD deployment in the summer of 2000 because of the substantial international problems he perceived such a decision would cause. In order to field a system able to protect all 50 states, as had been stipulated by the Missile Defense Act, the ABM Treaty needed to be amended, but the Russians did not accept that there was any need for this, and other international allies and strategic competitors remained deeply against any violation of the Treaty. According to Robert Bell, Clinton always had in the back of his mind the international and diplomatic cost that ordering deployment would entail, and this was a key reason, in addition to technology, why he decided to postpone it.[135] Another senior Administration official would later explain that "Clinton decided not to authorise construction outside the Treaty because he didn't want to be responsible for busting the relationship with Russia".[136] Nevertheless, Bell later suggested that the decision was a "close call".[137]

In the end Clinton announced during a speech at George Washington University on the 1st September 2000 that:

> I simply cannot conclude, with the information I have today, that we have enough confidence in the technology and the operational effectiveness of the entire NMD system to move forward with deployment.[138]

As a result, the first possible date for the system to become operational slipped from 2005 to at the earliest 2006, as work would not begin on the radar site in Alaska until the next year. Michael Krepon later remarked that "Clinton got the balance right" because there were only "fictional benefits" of ordering deployment and getting rid of the Treaty.[139] In Bradley Graham's view, the

[135] Interview with Robert Bell (6th March 2010)
[136] Ibid
[137] Ibid. Bell would also later declare that the decision was not ideological, but was based purely on the criteria that had been set out during Clinton's first term.
[138] Burns (1st September 2000)
[139] Interview with Michael Krepon (1st June 2010)

decision was also overshadowed by the president's focus on developments in North Korea and the Middle East.[140]

Clinton decided to postpone a decision on deployment of a national missile defence for two main reasons; firstly, the technology had not been proved mature enough, and secondly Clinton was desperate not to upset international stability by abrogating the ABM Treaty. Clinton was not helped by either the politically driven NMD development schedule that made technological problems almost inevitable, or by Russian intransigence and other international complications over amending the ABM Treaty. This in turn, according to John Holum, was a product of the "rushed schedule" following the events of 1998.[141] Ultimately, although the administration was not against beginning to field a national missile defence system if the threat warranted it, and tried hard to find a compromise whereby the NMD plan could remain within the ABM Treaty, the maintenance of the Treaty continued to be a more important foreign policy priority. Nevertheless, Clinton set in train policies that were ultimately to derail the Treaty under the next president.

(3) Assessing the drivers of policy, 1997-2001

Alterations in the international system largely explain why Clinton was forced to change gear on BMD during this period, while the immaturity of missile defence technology and the importance placed on the relationship with Russia, would appear to explain why the president did not order deployment in 2000. However, these dynamics do not clarify the full story, and as such, the importance of domestic variables needs to be evaluated; particularly the institutional balance between president and Congress, and the political divide between Democrats and Republicans, in order to understand the particular rhythms of policy between 1997 and 2000.

[140] Interview with Bradley Graham (11th June 2010). According to Graham, "With NMD stalled, the Clinton administration in its final few months pursued a diplomatic opening with North Korea … an agreement to halt missile sales, and not deploy, produce, or test missiles with a range of over 500km". Graham (2003) 336
[141] Interview with John Holum (27th July 2010)

International and technological factors

International and systemic pressures broadly explain the direction and evolution of policy between 1997 and 2001. The North Korean missile tests in 1998 – which compounded the findings of the influential Rumsfeld Report – largely explain why the contours of the missile defence debate shifted, and why the US moved inexorably closer to deploying both national and theatre missile defences during this period. At the same time, international pressures partly explain Clinton's reluctance to commit his administration to a deployment decision. In particular, Clinton remained conscious of Russian and Chinese opposition and the views held by key US allies of US BMD plans, and of the negative international implications he believed such a move would have for international stability. Developments in the international system can also explain to some extent why Democrats shifted position midway during this period from outright opposition and attempting to prevent Republican NMD legislation, to a positioning of trying to ensure the programme remained within the ABM Treaty.

Nevertheless, changes in the international system do not explain why Clinton signed the 1999 Missile Defense Act but then decided against making a decision on deployment in 2000. Neither do systemic pressures explain why the focus of US BMD policy shifted from theatre and battlefield missile defence to national missile defence despite the fact that the new types of threat appeared to be limited, short-range and primarily regional.[142] But perhaps most importantly, international pressures do not explain why Clinton signed the Missile Defense Act despite having no credible deployment plan, or indeed, one that appeared technologically, politically or strategically viable.[143] Above all, the international system cannot explain why opinion remained fundamentally divided over BMD between Republicans and Democrats, and between president and Congress.

[142] See Joseph Cirincione, "Assessing the assessment' the 1999 National Intelligence Estimate of the ballistic missile threat", *The Nonproliferation Review*, (Spring 2000), 125-137

[143] In fact, James Lindsay & Michael O'Hanlon would also warn, "there is no need to rush to build an NMD system by mid-decade … neither the evolution of threat, the state of technological development, nor the status of missile defense diplomacy warrants haste". (2001) 23

Some of these dynamics can be explained by developments in technology – or more specifically – the lack of it. In particular, Clinton's decision to push back the earliest possible deployment date for a national BMD system to 2005, and then not to order deployment in late 2000, was certainly shaped by the fact that he didn't feel that enough successful testing had been conducted to push ahead.[144] The absence of credible technology also explains the resistance shown by both Clinton and the Democrats to Republican calls for early NMD deployment. However, the progress in technology does not explain why Clinton pursued a missile defence plan that appeared largely at odds with his wider foreign policy agenda. Neither can technology explain why Clinton decided to jeopardise and complicate relations and arms reductions with Russia by pushing for ABM Treaty amendments, or why the Republican Party continued to legislate for near-term national missile defence deployment. Consequently, neither developments in the international system nor the capabilities of technology can fully explain the particular evolution of policy during this period.

Domestic factors

To fully understand why policy evolved in the manner it did between 1997 and 2001 requires examination of the actions and thinking of President Clinton and lawmakers in Congress. The Clinton administration's policy agenda and decision to pursue a national missile defence deployment plan for primarily *domestic political reasons,* explains why policy appeared to be in disarray by 1999. However, this in turn can only be understood by assessing the particular influence of a determined Republican leadership in Congress to shape and push ahead with policy, which was also driven in part by *domestic political reasons*. As a May 2000 op-ed declared:

> Given the serious technical, cost and arms control problems plaguing the Clinton administration's proposed NMD system, the most convincing explanation for the undue haste with which this issue is being decided is that both the Clinton Administration and its

[144] Clinton (2004) 908. Clinton would later recall that it was because "at the time we didn't have a missile system reliable to deploy".

> conservative adversaries in Congress and the Bush campaign, are playing politics with the missile defense issue.[145]

As such, it was both the Clinton administration's complex and in some respects contradictory international policy agenda, and the political interplay both within Congress and between Congress and the president, that would shape policy between 1997 and 2001.

President Clinton's actions and policy priorities were a key reason why the missile defence programme evolved in the manner it did. In particular, it was his desire to retain international stability through continued adherence to the ABM Treaty, while at the same time attempting to depoliticise the issue of BMD domestically, which would shape policy. More specifically, the importance given to the relationship with Russia (at least in terms of nuclear reductions) ensured that developing and deploying national missile defences would be a complicated diplomatic undertaking, while the general lack of attention given to the programme domestically meant that the technological requirements of deployment were only seriously considered in late 1999. In addition to this, presidential pressure on policy making, and the domestic politics of BMD, would also be shaped by the impeachment trial that Clinton faced during this period. The multifaceted problems that confronted the Clinton administration by 2000, namely trying to balance a wide range of international and domestic requirements, were a direct result of these dynamics. The result, in the words Anthony Cordesman, was that domestic political dynamics created a "lowest common denominator system" largely bequeathed by the "incessant political battles between the administration and Congress".[146]

Nevertheless, it is unlikely that the Clinton administration would have been pressured into confronting these issues or taking these decisions, had it not been for the pressure exerted on policy by Congress. Although much of the BMD debate was confined to Congress during 1997 and 1998, by 1999 both parties had essentially reached a loose agreement on BMD, which would become codified in the 1999 Missile Defense Act. This can partly be explained by the change in attitude of

[145] William Hartung & Michelle Ciarrocca, "Tangled web: the marketing of missile defense 1994-2000", *worldpolicy.org special issue brief,* (May 2000)
[146] Cordesman (2002) 13-4

the Democratic leadership in Congress, which after 1998, and specifically after the Clinton administration appeared to change tack, softened their stance on BMD deployment. However, the main pressure was produced by the unstinting desire of the Republican leadership to push for deployment, which in 1999, after five years of pressure, looked set to be realised. Nevertheless, the amendments written into the Missile Defense Act at the Democrat's behest ensured that Clinton retained enough flexibility to defer deployment of the system in 2000. In the words of Walt Slocombe:

> A lot of this was pure politics. But if you could find a responsible and useful use for missile defence, then the fact that it could nullify some Republican pressure was far from being a bad thing.[147]

Consequently, policy was a reflection of both *domestic political actors* in general, and of *domestic political reasons* in particular. In this sense, while genuine support existed for BMD both within Congress and the White House, the rhythms of policy were essentially shaped by party politics and by the particular pressures arising from the institutional balance between president and Congress during this period.

Conclusion

Bill Clinton's second term in office represents a period of marked change in US ballistic missile defence thinking, whereby debate shifted noticeably closer towards acceptance of both battlefield and some type of national BMD deployment. For example, in 1996, debate about US national missile defence plans remained staunchly partisan, and split between those advocating deployment and those advocating further research and development. By 2001, this debate had shifted to a point where disagreement was about how to field such a system, what guise this system would take, and how this could be balanced with other international dynamics and pressures. By the end of

[147] Interview with Walt Slocombe (3rd August 2010)

Clinton's presidency, the US had largely moved towards accepting that both TMD and NMD had a role to play in US national security strategy.

This shift in thinking can be explained by a collection of dynamics driven by perceived developments in the international system. As such, whereas Clinton's 1996 "3+3 plan" was arguably the product of domestic party political pressures, the 1999 Missile Defense Act reflected a growing acceptance that the missile threat was increasing faster than had previously been believed. Specifically, the 1998 North Korean missile launch and Rumsfeld Report cemented the idea that the environment in which the US was acting was changing. Nevertheless, the debate may not have moved forward as briskly during this period had it not been for the incessant pressure from Republicans in Congress, and for the political manoeuvring of President Clinton. It is therefore unlikely that the perceived changes in the international system would have had quite such an impact were it not for Republican dominance in Congress, and Clinton's natural desire to chart a political middle ground. As a result, the speed and shape of the change in the debate must be put down to the particular influences of both president and Congress, and to both *domestic political actors* and *domestic political reasons*. According to Anthony Cordesman,

> It is extremely unlikely that such a system architecture would ever have evolved in this particular form if a pro-NMD Republican president had not first faced anti-NMD Democrat majorities in Congress, and if President Clinton had not had to make key decisions at a time when he was perceived as weak on defense and had to deal with the threat of impeachment.[148]

As Bill Clinton left office, the US ballistic missile defence programme and debate had shifted considerably, and although the pace at which BMD would advance would likely be conditioned by the outcome of the 2000 presidential election, it seemed probable that BMD would continue to play a bigger role in the future. That said, there was still little indication that the Pentagon had mastered the problems of "hitting a bullet with a bullet", or that North Korea, Iran or Iraq were on the brink of being able to threaten the US homeland with a nuclear-armed ICBM. Nevertheless, by 2001 both national and theatre missile defence had essentially become accepted as

[148] Cordesman (2002) 14

an important future component of US national security strategy, and debate had largely shifted from zero-sum disagreements about NMD to differences about the extent, type and effectiveness of such defences.

George W. Bush, ABM Treaty Abrogation and Deployment, (2001-2005)

George W. Bush took office with very different ideas about ballistic missile defence than had Bill Clinton. In fact, Bush was probably the first post-Cold War president to truly embrace the idea of BMD. Bush fervently believed that the US could no longer rely on Cold War security frameworks, and specifically that the 30-year-old Anti-Ballistic Missile Treaty should either be fundamentally adapted, or abrogated, in order to allow the US to deploy a full range of both offensive and defensive weaponry to ensure its security. In Bush's mind, the US needed the freedom to deploy a range of ballistic missile defences in order to meet the new missile threats of what he and many in his administration believed to be a more dangerous and unstable international environment. Nevertheless, as Bush took office, the US remained bound by the ABM Treaty and limited by the technological immaturity of the majority of BMD systems under development at the time. Moreover, Bush entered office faced with a Democratic leadership in Congress determined to limit Bush's BMD plans and retain the ABM Treaty as the centrepiece of US security. As a result, in early 2001, it was unclear whether Bush would be able to push ahead with the type of BMD programme that he wanted.

Had terrorists not attacked the US on September 11th 2001, it is arguable that Bush's missile defence plans may have remained hampered, and it is equally likely that his administration would have found it far harder to abrogate the ABM Treaty. However, the events of that day – while not necessarily changing the views of those within the administration[1] – did provide the political opportunity for Bush to push ahead. As a result, within two years of the ABM Treaty ending, the

[1] According to Eric Edelman, the Administration saw the attacks as "essentially a missile attack" using fully fuelled airliners as a ballistic missile, which compounded, rather than altered, their fears about the growing missile threat to the United States. Interview with Eric Edelman (20th July 2010)

Bush administration had begun fielding long-range missile interceptors at two bases on the US homeland, begun informal discussions about further deployments in Europe and elsewhere around the world, and were actively pursuing a wide-range of different BMD programmes. The pace of these developments had much to do with a new type of deployment plan adopted by the administration – one whereby assets would be deployed before fully tested – under a model known as spiral development. When this was coupled with Democratic acquiescence after 9-11, and a Republican controlled Congress after 2002, the Bush Administration was able to push ahead precipitously with its BMD plans. The result was a seismic shift in the BMD debate.

The developments during this period therefore raise several interesting questions. First, why did Bush view the abrogation of the ABM Treaty as integral to US security, while the Clinton administration had remained determined not to undermine it? Second, why did the Bush administration pursue a technological development and deployment model that allowed BMD assets to be deployed before being fully tested or proven? Third, why did the terrorist attacks of 9-11 have such a transforming impact on the debate, despite having relatively little direct connection with BMD policy? In order to understand these questions an examination of the interplay between domestic, international and technological influences, and how these combined to produce the complicated policy outcomes described above, is required.

(1) Competing pressures on BMD policy, 2001-2005

Despite the progress made during the Clinton administration, as Bush began his presidency, US missile defence plans remained constrained by the ABM Treaty and international opinion, and technologically by a range of engineering and developmental problems. Moreover, and although Bush entered office determined to push ahead and deploy both national and theatre missile defences as soon as possible, his administration remained hampered by the continued scepticism of the

Democratic leadership in Congress. As such, it was widely felt that a polarised partisan debate, as well as international and technological pressures, would impede progress on BMD.[2]

International pressures on policymaking

International pressure on the BMD debate during this period was a direct reflection of the changing balance between the importance of strategic relations with Russia and the growing threat from rogue states. This pressure was also split between the first two years of Bush's presidency and the second, or more specifically, between the years before abrogation of the ABM Treaty, and the years that followed. On top of this, perhaps the most important international pressure was the terrorist attacks of September 11th 2001, which although not directly linked to the issue of missile defence, had a significant transforming impact on the domestic debate in general, and threat perception in particular.

As Bush took office, there was little to suggest that Russia, China, or many US allies in Europe had changed their largely sceptical views of US BMD plans. Russia and China remained concerned about the impact that US BMD plans would have on nuclear deterrence and on their respective security and status[3], while US allies, particularly in Europe, were concerned about the greater international instability that such a move might bring.[4] As a result, international opinion remained firmly behind the ABM Treaty at the beginning of this period, and Moscow and Beijing continued voicing their concerns about US BMD plans throughout.[5]

At the same time, and although the latest National Intelligence Estimate released in December 2001 suggested that any new long-range missile threat to the US remained *at least* a

[2] Alison Mitchell, "Top Democrats warn of battle of missile plan", *New York Times,* (3rd May 2001)
[3] See Michael McDevitt, "Beijing's bind", *The Washington Quarterly,* 23:3 (2000), pp177-186 and Alexander Pikayev, "Moscow's matrix", *The Washington Quarterly,* 23:3 (2000), pp187-194
[4] See Colin Gray, "European perspectives on U.S. ballistic missile defense," *Comparative Strategy,* 21 (2002), pp279-310, and Philip Gordon, "Bush, missile defence and the Atlantic alliance", *Survival,* 43:1(2001), pp17-36
[5] See Igor Ivanov, "The missile defense mistake: undermining strategic stability and the ABM Treaty", *Foreign Affairs,* 79:5 (2000) pp15-20

decade away,[6] pressure continued to grow from developments in Iran, North Korea and Iraq. In August 2002 for example, Iranian dissident Alireza Jafarzadeh revealed that Teheran had been pursuing a secret nuclear weapons programme, and had already constructed a uranium enrichment facility at Nanantz, and a heavy water facility at Arak, deep inside Iran.[7] The North Korean decision to expel IAEA weapons inspectors and to restart its uranium enrichment programme at Yongbon in December 2002, combined with the announcement in January 2003 that it would be leaving the Nuclear Non-Proliferation Treaty, compounded this growing concern.[8] Although the declaration by Tripoli that Libya would be giving up its WMD programme in late 2003 served to lessen the threat,[9] as did, in theory, the invasion of Iraq and removal of Saddam Hussein the same year, concern continued to grow about the rogue state WMD threat – particularly after 9-11.[10]

The final key international dynamic during this period was the impact of the terrorist attacks of September 11th 2001, and the subsequent decision taken by the Bush administration to abrogate the ABM Treaty. Essentially 9-11 had three significant implications. First, the attacks ushered in a new sense of vulnerability, and for some within the Bush Administration, highlighted the fact that the US could no longer rely solely on Cold War era national security thinking.[11] Second, the attacks paved the way both domestically and internationally for the end of the ABM Treaty, and as such opened the door for the Bush administration to begin legally developing and deploying a comprehensive missile defence system. Thirdly, in the wake of the attacks, America's NATO allies would begin a gradual move towards accepting BMD, and even Russia would suspend its opposition to US missile defence plans. The net result was that the US was no longer legally, and to an extent diplomatically, bound to limit missile defence plans.

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[6] "Foreign missile developments and the ballistic missile threat to the United States through 2015", National Intelligence Council, (December 2001)
[7] Richelson (2007) 512. For more on this see Alireza Jafarzadeh, *"The Iran threat: President Ahmadinejad and the coming nuclear crisis",* (New York, Palgrave MacMillan: 2007)
[8] James Laney & Jason Shaplen, "How to deal with North Korea", *Foreign Affairs*, 82:2 (2003), pp16-30: 16-19
[9] For more on this see Paul Kerr, "Libya vows to dismantle WMD programme", *Arms Control Today*, (Jan/Feb 2004)
[10] Laney & Shaplen (2003) 16-19
[11] James Mann, *"The rise of the Vulcan's: the history of Bush's war cabinet",* (London, Penguin Books Ltd: 2004) 313-4. According to Mann, "September 11th greatly accelerated the Administration's willingness to re-think cold war ideas about national security".

As a result, international pressure on policymaking varied during this period as the balance between rogue state missile threats and diplomatic relations with Russia and China appeared to shift. Moreover, with the abrogation of the ABM Treaty, the international legal context changed, which meant that the US was no longer constrained in what it was able to test and deploy. However, the wars that would follow in Afghanistan, and particularly in Iraq, would influence US BMD policy both through their cost, and through the international diplomatic fallout that they would cause.

Technological pressures on policymaking

Although the Bush administration would double funding for missile defence research and development during this period, the majority of commentators and independent scientists remained sceptical of the capability of the technologies under development. In fact, a review conducted by the Pentagon in 2001 found that other than the Ground-Based Interceptor programme and the Patriot system, very few technologies were anywhere near ready for deployment.[12] Moreover, many of the tests of these systems remained developmental in nature.

Throughout this period the independent science and engineering community in the US expressed strong scepticism that there was any technological justification for rushing ahead with deployment of an integrated ballistic missile defence system.[13] Even some members of the Bush administration remained unconvinced about the capability of some technologies. A key part of the reason for this was that the Pentagon simply did not conduct many tests of the system between 2001 and 2005, and that when they did, the results of these tests were often classified and characterised as being far from "realistic".[14] In fact, the failed test of the Ground-Based Midcourse Defense System

[12] Graham (2003) 360-1
[13] See for example GAO (23rd April 2004); Gronlund et al (May 2004)
[14] Confidential interview (E)

in December 2004 would be the last trial before testing shifted to "operationally configured interceptors" i.e. those that had been deployed.[15] According to one Senior Official:

> The result was that many independent scientists and engineers felt that there simply was not enough evidence to support a decision about early deployment or abrogation of the ABM Treaty, let alone actually putting the interceptors in the ground.[16]

That said, progress was made in other BMD technologies that continued to improve during this period, notably battlefield systems such as Patriot.[17]

The second key technological pressure on policy came from a fundamental change in how the BMDO (after 2002 the US Missile Defence Agency) went about developing and deploying BMD systems.[18] In 2002, the Bush administration announced that it would be adopting a "capabilities based approach with spiral development", which would replace the "fly before you buy" model used by previous administrations. Under this new model, BMD assets could be deployed before being fully tested, and once deployed, could be altered and upgraded as technologies advanced and threats changed. Although this meant that many commentators and lawmakers were deeply sceptical of the capability of the assets deployed in 2004[19], this model did allow US troops to use Patriot PAC-3 batteries during Operation Iraqi Freedom in 2003, which they would not otherwise have been able to do under fly before you buy.

Much of the testing and development of missile defence technologies during this period suggested that the US remained years away from deploying a national missile defence system. In fact, because so little testing had been done, many did not think that the Pentagon had enough information to even make a credible deployment decision in 2004, let alone begin putting

[15] The Ground Based Interceptor missile failed to launch due to problematic software configuration leading Senator Jack Reed (D-RI) to exclaim "I think it points out the inherent complexity of the system and underscores the need for rigorous testing before any deployment". Bradley Graham, "US missile defence test fails", *The Washington Post*, (16th December 2004)

[16] Confidential interview (E)

[17] Interview with Henry Obering (9th August 2010). In fact, Obering would later remark that a huge push for Patriot came from the war fighters themselves – especially after Operation Iraqi Freedom in 2003.

[18] See Graham Spinardi, "Ballistic missile defence and the politics of testing: the case of the US ground-based midcourse defence," *Science and Public Policy*, 35:10 (2008) pp703-715

[19] Wade Boese, "Congress backs Bush's defense budget", *Arms Control Today*, (July/August 2004). Senator Carl Levin remarked, "If we want a missile defense will works rather than one that sits on the ground and soaks up money, we should not shy away from realistic testing requirements".

interceptor missiles in the ground.[20] However, this was largely tempered by the adoption of a new development and deployment strategy by the Bush administration, which ensured that assets could be deployed earlier than they might have been before.[21]

Presidential policy agenda

George W. Bush entered office convinced that missile defences were an important component of US national security policy in an era where the requirements of nuclear deterrence, and the types of threat that the US faced, had changed. Bush viewed missile defences as fundamental to ensuring US security against rogue states, which he and many of those around him, believed were intent on acquiring and possibly using nuclear weapons. The president also hoped that missile defence deployments could be combined with US (and possibly Russian) nuclear disarmament as part of a "new strategic framework" that would finally put an end to the Cold War thinking about arms control.[22]

Unlike the two presidents that preceded him, Bush entered office firmly committed to deploying missile defences, and if necessary, unilaterally withdrawing from the ABM Treaty. According to then Deputy National Security Adviser Stephen Hadley, Bush strongly believed that the "US needed to move beyond Cold War thinking" and this meant abrogating the ABM Treaty to allow for the deployment of limited national missile defences.[23] According to Bush:

> Today's world requires a new policy, a broad strategy of active non-proliferation, counter-proliferation and defenses … we need new concepts of deterrence that rely on offensive and

[20] See for example Gronlund et al (May 2004). The UCS report continued "The administration's claims that the system will be reliable and highly effective are irresponsible exaggerations … there is no technical justification for deployment of the system, nor are there sound reasons to procure and deploy additional interceptors". (May 2004) ix
[21] Spinardi (2008) 703-715
[22] According to Bush, "The deployment of missile defenses is an essential element of our broader efforts to transform our defense and deterrence policies and capabilities to meet the new threats we face", Bush (2002). Also on this see, George Perkovich, "Bush's Nuclear Revolution: A Regime Change in Non-Proliferation", *Foreign Affairs,* 82 (2003) pp2-8
[23] Interview with Stephen Hadley (26th July 2010)

> defensive forces … defenses can strengthen deterrence by reducing the incentive for proliferation.[24]

This mix of offensive reductions, defensive deployments and other counter-proliferation measures would become the central tenets of Bush's "new strategic doctrine", and would mark a fundamental break from previous policy. Under this new thinking, nuclear reductions with Russia would be pursued at the same time as ballistic missile defences were deployed to counter the growing WMD threat from rogue states.[25] Bush outlined this thinking in a speech on 1st May 2001:

> Today, the sun comes up on a vastly different world … Russia is no longer our enemy … yet this is still a dangerous world, a less certain, a less predictable one. More nations have nuclear weapons and still more have nuclear aspirations … most troubling of all, the list of these countries includes some of the world's least responsible states … unlike during the Cold War, today's most urgent threat stems not from thousands of ballistic missiles in Soviet hands, but from a small number of missiles in the hands of these states.[26]

In the words of Special Assistant to the President, Robert Joseph, the Administration was determined that "arms control would not get in the way of nuclear reductions".[27]

Finally, Bush entered office surrounded by a group of hawkish conservative advisers and officials, dubbed "the Vulcans".[28] Foremost amongst this group was National Security Adviser Condoleezza Rice who had earlier made it clear that she saw the threat from rogue states and nuclear proliferation as "the most important reasons to deploy missile defenses as soon as possible".[29] Other prominent figures included Undersecretary of Defense for Policy Paul Wolfowitz, Vice President Dick Cheney – both of whom had a strong dislike of the ABM Treaty, and Secretary of Defense Donald Rumsfeld, who according to Stephen Cambone, had spent the two years since the publication of the "Rumsfeld Report" thinking long and hard about missile defence.[30]. Consequently, Bush entered office with a team of advisers – with the exception of

[24] George W Bush, "Remarks by the president to students and faculty at National Defense University", (1st May 2001)
[25] The rationale being that defensive deployments would encourage further offensive deployments, and vice versa in an upward spiral, leading to less security for all. By prohibiting defences, the logic continued, a balance of offensive weapons could be reached that would grant some kind of stability through mutual assured destruction (MAD). For more on this see Freedman (2003)
[26] Bush (1st May 2001)
[27] Interview with Robert Joseph (29th July 2010)
[28] See Mann (2004)
[29] Condoleezza Rice, "Promoting the national interest", *Foreign Affairs,* 79 (2000), pp45-62: 59 & 61
[30] Interview with Stephen Cambone (5th August 2010)

Secretary of State Colin Powell[31] – that viewed the world in a similar way, and were all positively disposed towards the idea of ending the ABM Treaty and deploying missile defences.[32]

Under Bush, presidential pressure on policymaking was strongly geared towards deploying a range of integrated missile defences as soon as possible. A key reason for this was the pessimistic view of Bush and many of those around him about the unstable and dangerous nature of the international system, but it was also part of Bush's vision to move beyond the Cold War logic of MAD and move to an era where missile defences could be combined with nuclear reductions. Moreover, unlike either George H. W. Bush or Bill Clinton, George W. Bush was also far less concerned about Russia - who he "really didn't think was a problem" - and far more optimistic about BMD technology.[33] In the words of Principal Deputy Assistant to the Vice President for National Security Affairs Eric Edelman, this was driven by Bush's determination to "finally end the thinking that had dominated the Cold War relationship with Russia" because he "cared far more about Iran, Iraq and North Korea".[34]

Congressional pressure on policymaking

At the start of 2001, attitudes towards BMD remained split along party lines in Congress, and the Democratic leadership would begin this period determined to limit Bush's missile defence plans, especially anything that undermined the ABM Treaty.[35] However, and while Democrats launched vocal attacks on the Bush administration's plans during the first half of 2001, the party leadership

[31] Mann (2004) 314. Powell had supported missile defence since his days in the Reagan administration, but was keen to work out a compromise with Russia that would keep US plans within the confines of the Treaty. In the end, Powell's efforts would fall through as Bush and Rice sided with Rumsfeld and Wolfowitz and opted to abrogate the Treaty in late 2001.
[32] See also, Wade Boese, "Bush assembles pro-missile defense national security team", *Arms Control Association,* (January/ February 2001)
[33] Interview with Eric Edelman (20th July 2010)
[34] Ibid
[35] Confidential interview (A); Confidential interview (B). In fact, Alison Mitchell suggested that the Democrats "saw BMD as a natural wedge issue; it promised to rally large numbers of Democrats opposed to an unproven and expensive missile defense system". Alison Mitchell, "Top Democrats warn of battle on missile plan", *New York Times,* (3rd May 2001)

was only really able to apply serious pressure on policy after Senator James Jeffords defected from the Republican Party in May, giving the Democrats control of the Senate.[36] From this new position of strength, the Democratic leadership began reworking Bush's proposed BMD budget, redirecting funds to other Pentagon projects, and cancelling funding for anything that appeared "inconsistent with the ABM Treaty".[37] Republicans, while keen to support their president and back the administration's revamped missile defences plans, were relatively powerless in the face of Democratic control of Congress during the summer of 2001.[38]

Congressional pressure on policymaking changed considerably with the terrorist strikes of 9/11. Democrats almost immediately became less willing to directly oppose the president's plans, and consequently relaxed their opposition to Bush's budget request.[39] Moreover, although Democrats remained concerned about Bush's desire to abrogate the ABM Treaty, and would continue to apply pressure – particularly for more rigorous testing and oversight before deployment – after 2001 the debate had changed. This shift was compounded in late 2002 as Republican victories in the Congressional elections ensured that Congress exerted relatively little pressure on BMD during the second two years of Bush first term; instead, lawmakers were largely complicit with the president's plans during 2003 and 2004.[40] Fundamentally, the actions of the Bush administration shifted the political debate in Congress during this period from disagreements over whether to deploy and how, to disputes about the pace of deployment, and ensuring what was deployed was properly tested.

[36] Tony Karon, "How Jim Jeffords changed the world", *TIME*, (29th May 2001)
[37] Wade Boese, "Democrats withdraw missile defense restrictions", *Arms Control Today,* (October 2001)
[38] Confidential interview (D)
[39] Boese (October 2001)
[40] Confidential interview (D). One senior Republican official declared that Republicans went along with Bush's plans primarily for "political solidarity", and because "we believed it was better to have something than nothing in order to stay ahead of the threat".

(2) The evolution of policy, 2001-2005

Although the US BMD debate had moved forward during Clinton's presidency, the future shape, type and pace of deployment remained uncertain. Primarily, this was because in early 2001, US missile defence plans remained constrained by the ABM Treaty, and by the relatively underdeveloped and immature state of technology. Moreover, much suggested that the political battles that had surrounded missile defence during the 1990s between Democrats and Republicans would continue, which in turn suggested that Bush's plans would be heavily scrutinised throughout this period. As a result, and even though Bush took office keen to push ahead with missile defence, it was unclear how the US BMD programme would develop during his presidency.

2001: Ballistic missile defence before 9/11

According to Washington Post correspondent Bradley Graham, although Bush's interest in missile defence could be traced back to the 1980s, and in particular, to Ronald Reagan's SDI speech, the issue had featured little in Bush's political career until he embarked upon his campaign for the presidency in the late 1990s.[41] In fact, it wasn't until September 1999 during a speech in South Carolina that Bush publicly declared his intention to deploy both "theatre and national missile defences at the earliest possible date" and that this would be done "even if Russia did not agree to amend the ABM Treaty".[42] Following this, the issue of missile defence would become a key defining issue for Bush in the presidential campaign against his Democratic rival Al Gore in the summer of 2000.[43] Bush accused the Democratic candidate of being complicit in the Clinton administration's "excessively deliberate, limited and half-hearted a BMD policy",[44] and warned the then incumbent Democratic administration against concluding a deal with Russia that would hinder

[41] Indicative of this, as Governor of Texas (1995-2000) Bush had joked that the only foreign country he needed to worry about was Mexico. Graham (2003) 340
[42] Quoted in Graham (2003) 344
[43] Ibid 344-5
[44] Gordon (2001) 18

any future US NMD deployment, saying that "no agreement would be better than a flawed agreement" on the ABM Treaty and BMD.[45] However, despite speaking vociferously about BMD during the election, and while few questioned the fact that, if elected, Bush would look to push ahead and expand the programme, James Lindsay and Michael O'Hanlon described Bush as being "long on rhetoric but short on detail" about the specifics of this missile defence plan.[46] Moreover, it was assumed that the Bush administration would prioritise its domestic agenda, which included a $1.6t tax cut and education reform.[47]

One of the first things that Bush did upon assuming office was to order Secretary of Defense Donald Rumsfeld and leading officials at the Pentagon, to conduct a wide-ranging and extensive review of BMD technologies and programmes currently under development. Under instructions from Bush, Rumsfeld told Pentagon officials to think "outside of the box" when it came to the types of programmes or systems that it might be both possible or necessary to develop, and most importantly made it clear that these should not be constrained by what may or may not be permitted by the ABM Treaty.[48] When it was completed two months later, the review found that other than the Ground-Based Interceptor (GBI) system preferred by the Clinton administration (and which was originally based on the ERIS interceptor), and the Patriot theatre BMD system used by the Army, very few technologies were anywhere near being ready for deployment.[49] To help streamline the missile defence effort and in order to prioritise the most promising technologies and pursue a wide variety of systems, Rumsfeld abolished the bureaucratic distinction between "national" and "theatre" BMD systems, and integrated all BMD research and development under one institutional umbrella.[50] To fund the new BMD project the administration asked Congress for a 57% increase in

[45] Wade Boese, "Bush outlines arms control and missile defense plans", *Arms Control Today*, (June 2000)
[46] James Lindsay & Michael O'Hanlon, "Missile defense after the ABM Treaty", *The Washington Quarterly*, 25:3 (2002), pp163-176: 164
[47] Ivo Daalder & James Lindsay, *"America unbound: the Bush revolution in foreign policy",* (New Jersey, John Wiley & Sons Inc: 2005) 47
[48] Graham (2003) 360-1
[49] Ibid 351
[50] Ibid

funding for BMD for fiscal year 2002, taking the annual appropriation from $5.3b to $8.3b.[51] Although the majority of funds were given to the GBI, the budget also gave significant preference to other means of protecting against long-range threats, and included plans to give both THAAD and the Navy Theatre Wide (NTW) system long-range defensive capabilities.[52]

Although it had been clear that the Bush administration was preparing and planning to push ahead with missile defence, it was not until 1st May 2001 during a speech to students and faculty at National Defense University that Bush outlined his vision for the future of US missile defence policy. The key point to the speech was that "missile defenses were needed to counter the different threats of today's world", and equally importantly, Bush stated:

> We must move beyond the constraints of the 30 year-old ABM Treaty. This Treaty does not recognize the present, or point us to the future. It enshrines the past. No Treaty that prevents us from addressing today's threats, that prohibits us from pursuing promising technology to defend ourselves, our friends and our allies is in our interests or in the interests of world peace.[53]

Although the actual shape and components of the plan remained vague, Bush continued to stress that the US BMD programme would come into conflict with the ABM Treaty in "months not years".[54] However, the president was also equally eager to convince the international community that US action regarding missile defence and the ABM Treaty would not be unilateral. In fact, he made sure to call various European leaders personally to discuss the speech before it was made.[55] Bush was keen to stress that he "intended to prepare the diplomatic ground for a US withdrawal [from the ABM Treaty] rather than present the world with a *fait accompli*."[56] Nevertheless, neither Russia and China, nor America's traditional allies in Europe, responded particularly favourably to the speech. In Europe, notably in France and Germany – where relations had already been strained by Bush's decisions on the International Criminal Court and the Kyoto protocol – Secretary of

[51] Ibid 370
[52] Lindsay & O'Hanlon (2002) 165
[53] Bush (1st May 2001)
[54] Graham (2003) 351
[55] David Sanger, "Bush calls allies in advance of missile speech", *New York Times*, (1st May 2001)
[56] Daalder & Lindsay (2005) 62-3. Nevertheless, it was highly unlikely that the concerns of US allies would have changed Bush's mind.

Defense Donald Rumsfeld's announcement during a speech to a meeting of NATO defence ministers that he believed that the ABM Treaty "stands in the way of a 21st century approach to deterrence" was greeted with some trepidation, especially after Rumsfeld also made it clear that America had no reservations in moving beyond the Treaty, and that the Bush administration was likely to deploy certain BMD systems before fully testing them.[57]

Bush's plan was received with equal concern by Russia and China, and leaders from both countries cautioned the president against undermining the ABM Treaty and ushering in a new period of instability. Nevertheless, discussions with Russia about amending the Treaty had begun almost as soon as Bush entered office, and in February 2001, Bush sent Secretary of State Colin Powell to meet Russian Foreign Minister Igor Ivanov in Cairo, Egypt to discuss possible amendments.[58] Bush met Putin in person in Ljubljana, Slovenia during June 2001 to see what could be agreed regarding the ABM Treaty and missile defence, but Putin held firm, even threatening to place Multiple Independently Targetable Reentry Vehicles (MIRV)[59] on Russian ICBM's in response to any American BMD deployments not permitted by the Treaty.[60] Although Bush and Putin expressed a desire to move towards a "new strategic framework on nuclear arms reductions", nothing specific was agreed on the ABM Treaty.[61]

The Strategic Survey, published by the International Institute for Strategic Studies, claimed that; "no security issue so preoccupied the first nine months of an otherwise domestically focused Bush administration than the deployment of global missile defenses".[62] But despite this, very little of any tangible nature was achieved during the first nine months of Bush's first term in office, for although the president had made it clear he wanted to deploy an extensive system and move beyond the ABM Treaty, neither priority had achieved much progress. The reasons for this were partly

[57] James Dao, "Rumsfeld outlines fast track for missile shield", *New York Times*, (8th June 2001)
[58] Burns & Brune (2003) 190-1
[59] A MIRV'd warhead is a collection of nuclear weapons carried on a single intercontinental ballistic missile (ICBM) or a submarine-launched ballistic missile (SLBM), which can strike several targets independently from the same missile, making interception very difficult.
[60] Ibid 191
[61] William Safire, "Easy victory for missile defense", *New York Times*, (26th July 2001)
[62] "Missile Defense after 11 September", *IISS Strategic Survey* (2003) 27

technological; primarily the fact that an actual system simply didn't exist to be deployed, diplomatic; because the plan was not well received internationally, and political; because Congress and above all Democrats simply didn't feel that the threat justified Bush's policy.

The 2000 general elections had not only resulted in a negligible political mandate for George W. Bush, but had also greatly eroded Republican power in Congress. Consequently, for the first time since the Republican takeover of power six years earlier, Democrats could bring more influence to bear to the missile defence debate, and more directly on Bush's BMD plan. Moreover, with Bill Clinton now gone from the White House, the Democratic leadership were no longer constrained by the president's policy agenda, and subsequently set about transforming BMD into a key issue with which to energise and unite the party base against the Bush administration, much as the Republicans had done against President Clinton in 1994.[63] Senator Tom Daschle (D-SD) described the forthcoming battle over missile defence as "one of the most important and consequential debates we will see in our life time".[64]

Although the Democrats had begun their campaign in the Senate against Bush's new missile defence plan almost immediately upon taking office, real impetus did not arrive until Bush's National Defense University speech in May 2001.[65] The Democratic leadership raised sharp objections to Bush's plan, pointing to the likely negative impact on arms control, diplomacy and military strategy, as well as the budgetary implications of the proposal, and strongly voiced their concern that abandoning the ABM Treaty in pursuit of this goal would represent a grave mistake.[66] Senator Joseph Biden (D-DE) warned that "the devil is in the details" because Bush still hadn't actually outlined what he intended to do, while Senator Tom Daschle (D-SD) simply stated that "a missile defense system that undermines our nation politically, economically and strategically –

[63] Gildea (3rd May 2001)
[64] Quoted in Graham (2003) 366
[65] Gildea (3rd May 2001)
[66] Mitchell (3rd May 2001)

without providing any real security – is no defense at all".[67] What is more, because it was clear from the provisions of the budget request and the administration's plans in general, that the Bush administration would breach the ABM Treaty, Democrats on the Senate Armed Services Committee felt legally bound to clarify and if necessary oppose them.[68] As such, Senator Carl Levin (D-MI) maintained that Democrats would "try in some way to stop the expenditure of funds for a system that would abrogate the ABM Treaty".[69] Nevertheless, Vice President Dick Cheney's casting vote in the Senate meant that the Republicans retained de facto control of BMD policy.

On 23rd May 2001, Senator James Jeffords (R-VM) defected from the Republican Party to become an Independent, citing the strongly conservative agenda outlined by the Bush administration – including its missile defence plans – and in one stroke fundamentally altered the domestic BMD political context.[70] Jeffords defection tipped control of the Senate to the Democrats, handing them control of key committees in the US Senate, and thus the ability to set the political agenda and to stand up to the president's BMD programme.[71] The change put BMD sceptics Senator Carl Levin (D-MI) in charge of the Senate Armed Service Committee and Senator Joseph Biden (D-DE) at the Foreign Relations Committee. One commentator suggested that the transformation would mean that the Bush administration would no longer be able to "govern through a megaphone", and would be forced to seek consensus with Democrats who generally did not see missile defence as a priority.[72] As the Associated Press pointed out, one obvious implication was that "Bush's BMD plan would now come under much more scrutiny and pressure".[73]

With the Democrats now in charge of the Senate, lawmakers went to work immediately on Bush's proposed BMD budget, and by the 7th September the Senate Armed Services Committee had

[67] Ibid
[68] Confidential Interview (A)
[69] Ibid
[70] Karon (29th May 2001)
[71] Susan Page & Mimi Hall, "Political earthquake could hobble Bush", *USA Today*, (24th May 2001)
[72] Karon (29th May 2001)
[73] "Senate shift means less momentum for missile defense", *The Associated Press* (26th May 2001)

passed a Bill by 13 votes to 12 (along party lines) approving a revised version of the administration's request. The revision redirected $1.3b of the $8.3b request to other Pentagon projects, and included language that banned funding for any missile defence activities that Congress believed were "inconsistent with the ABM Treaty".[74] In the House, Representatives Ike Skelton (D-MO) and John Spratt (D-SC) filed an amendment to cut $918m from the budget request, cancelling much of the funds needed to begin construction of a test site in Alaska.[75] Although the Democrats did not want to end the programme entirely – for there was a perception that it could have an important role to play in the future – and were prepared to countenance increased funding for further research, they simply did not see the urgency of the Bush administration's plan, nor the need to upset the diplomatic international arms control system by running up against the ABM Treaty.[76]

One of the key reasons why Democrats remained so vehement in their opposition to Bush's proposed expansion of the American missile defence effort, was because the technology needed to achieve such a task seemed to remain many years away. In particular, continued problems with the missile defence development programme being carried out by the BMDO meant that the 4th test of the Ground-Based Interceptor missile did not take place until mid-July 2001, and even then Major General Willie Nance, head of the NMD programme at the BMDO, was quick to point out that the recent test was "scripted" and was very much a "developmental" rather than "operational" test success.[77] When this was coupled with a general lack of concern within Congress and amongst the US public – who remained far more interested in domestic issues such as education, Medicare and social security than on issues of national security – and particularly America's allies in Europe[78], very little support for what Bush was proposing to do existed outside of his administration.[79]

[74] Wade Boese, "Democrats withdraw missile defense restrictions", *Arms Control Today,* (October 2001)
[75] Ibid
[76] Alison Mitchell, "Senate leader to challenge Bush today on missile defense", *New York Times,* (9th August 2001)
[77] Burns & Brune (2003) 187
[78] For more on this see Colin Gray, "European perspectives on US ballistic missile defense," *Comparative Strategy*, 21 (2002) pp279-310
[79] Graham (2003) 350

Attitudes toward missile defence in Congress, particularly after the Democrats gained control of the Senate in mid-2001, was a key reason why Bush did not push ahead with BMD as precipitously as perhaps he might have liked during the first nine months of his administration. The Democratic leadership sought to make opposition to Bush's missile defence plans a key unifying issue for the party, and saw little need to damage international stability by running up against the ABM Treaty. On top of this, the American public remained relatively uninterested in matters of defence, and the technology – particularly the GBI programme – seemed a long way from proving itself ready to be deployed. Consequently, on the eve of 9-11 Bush's push for missile defence appeared to have stalled.

2001: The impact of 9/11 and the end of the ABM Treaty

The terrorist attacks of September 11th had three important transforming impacts on the American missile defence debate. The first was that it temporarily eradicated Democratic opposition to Bush's BMD programme as lawmakers moved quickly to show solidarity with the president. The second was that international opposition to Bush's missile defence plan weakened, as Russia and key European allies pledged their support to Washington. Lastly, and as well as providing a window of opportunity, 9-11 bolstered the perceived necessity of pushing ahead with BMD in the minds of the Bush administration. Thus, despite having a tenuous link at best with BMD, 9-11 changed the US missile debate substantially by reducing the perceived diplomatic and political costs that might previously have been associated with ABM Treaty withdrawal, or with rapid and expansive missile defence deployments.

The first and perhaps most important impact was that the terrorist strikes temporarily neutered the Democrat's attempts to contain Bush's BMD plan. In the words of Wade Boese, analyst at the Arms Control Association:

> Seeking to show solidarity with the president after the September 11th terrorist attacks, Democrats largely shelved legislative efforts to limit the Bush administration's ballistic missile defense plans.[80]

The fundamental reason for this was that leading Democrats – particularly Senator Carl Levin (D-MI) – had been equally shocked by the events, and did not want to look unpatriotic. Levin, who had led the Democratic campaign against Bush's proposed missile defence plan before 9-11, desperately wanted to avoid a fight over BMD in this new and uncertain period, stating that "this is the wrong time for divisive debate on issues of national defense".[81] A Senior Congressional Staffer later commented that this was because Levin was a "honourable man who was desperate to show solidarity with the president in a time of crisis".[82] Eight days after the attacks, Levin introduced a new Bill into the Senate that no longer limited Bush's BMD request, and two days after that, Levin and Senator John Warner (R-VA) co-sponsored an amendment that reinstated the $1.3b that had originally been cut.[83] Bradley Graham suggested that the Democrats had essentially been "politically handcuffed" by 9-11.[84]

The temporary relaxation of opposition to Bush's plans by the Democratic leadership did not however mean that they had dropped their strong support for the continuing validity and importance of the ABM Treaty, and while many lawmakers agreed that BMD should be pursued as part of a broader national security strategy, this did not necessitate any violation of the Treaty. Senator Jack Reid (D-RI) was quick to caution the Bush administration that ABM Treaty withdrawal would be "counterproductive because the US needs help from the international community, including Russia and China, in combating global terrorism", and unwarranted because most BMD "concepts remain many years away".[85] The Federation of American Scientists warned Bush to deny funding for:

[80] Boese (October 2001)
[81] Ibid
[82] Confidential Interview (A)
[83] Boese (October 2001)
[84] Interview with Bradley Graham (11th June 2010)
[85] Quoted in Wade Boese, "Pentagon outlines missile defense plan to Congress", *Arms Control Today,* (April 2002)

> Any program, project, or activity that is inconsistent with the Anti-Ballistic Missile Treaty. The tragic events of September 11 eliminated any doubt that America faces security needs far more substantial than a technically improbable defense against a strategically improbable Third World missile attack.[86]

The attacks also had significant ramifications internationally, and helped soften attitudes towards the Bush administration, and US BMD plans. Following the attacks, Vladimir Putin moved quickly to align Russia with the United States and pledged support for the US response.[87] As such, and as well as strengthening bilateral relations between Moscow and Washington, the attacks also quietened European criticisms of the Bush administration's plans.[88] Russian reaction to the Bush (and Clinton) administration's plans had been one of the key reasons that European allies had expressed concern about BMD, but with the newfound Russian willingness to work with the US – which Robert Bell suggested was driven largely by the belief that a "war on terror" would allow Russia far more freedom to deal with problems in Chechnya, and the Caucuses – much of this concern dissipated.[89] Moreover, many in Europe hoped that 9-11 would be the lynchpin for a new period of multilateral US policy.[90] According to Daalder and Lindsay, "the differences that had divided the United States from its allies and friends before September 11th gave way to widespread solidarity and support".[91] However, much like with the Democrats domestically, the 9-11 attacks did not mean that Russia or America's European allies would necessarily support US abrogation of the ABM Treaty.

The third impact of the terrorist attacks was on Bush and the Bush administration itself. According to the Strategic Survey, it "effected the administration's strategic calculations about how potential adversaries might wish to threaten the American homeland."[92] In particular, it reinforced Bush's belief that the world was a dangerous and threatening place where a determined adversary

[86] "Letter to Gorge W. Bush", *Federation of American Scientists*, (12th November 2001)
[87] Lindsay & O'Hanlon (2002) 171
[88] Gormely (2002) 19
[89] Interview with Robert Bell (6th March 2010)
[90] Mann (2004) 303
[91] Daalder & Lindsay (2005) 79
[92] *Strategic Survey* (2003) 40

would stop at nothing to threaten the United States.[93] Principal Deputy Assistant to the Vice President for National Security Affairs Eric Edelman, suggested that key Bush administration officials understood the events as "essentially a missile attack" because fully fuelled airliners were "not that much different to a conventional ballistic missile in practice".[94] In addition to raising question marks about air defence, Edelman argued that it also fundamentally underscored the notion within the administration that nuclear deterrence simply was not sufficient to keep the nation secure.[95] In the wake of the attacks, Bush declared that it was his duty to "protect American cities by all available means", which would include missile defence.[96]

Bush's interpretation of the 9-11 attacks and their relationship to missile defence was not unanimously held throughout the American political establishment, and many commentators cautioned that what 9-11 really demonstrated was that more sophisticated, cheaper and arguably more effective ways of attacking the US homeland existed, than the use or threat of ballistic missiles.[97] Of particular note, Dennis Gormley cautioned the Bush administration about this fixation on ballistic missiles, warning: "as policy makers look to the future, they should take care not to mistake the most familiar threats – such as ballistic missiles – for the most likely ones".[98] But despite this, 9-11 energised the Bush administration and made the president determined to push ahead with his missile defence plans.

The terrorist attacks of 11th September 2001 did not radically alter the policy or worldview of the Bush administration, or its approach to BMD, but it did provide the political opportunity to push ahead. With both domestic and international opposition temporarily moderated, the president wasted little time in seizing this opening, and once negotiations began to stall, informed Russia that the US would be leaving the ABM Treaty. This decision had little to do with technology, or indeed

[93] Daalder & Lindsay (2005) 79
[94] Interview with Eric Edelman (20th July 2010)
[95] Ibid
[96] Quoted in Graham (2003) 375
[97] Gormley (2002) 19
[98] Ibid 20

the missile threat; instead, it had everything to do with political window of opportunity presented by 9-11, and the worldview and policy priorities of the Bush administration.

Following 9-11, invigorated by the terrorist attacks, and sensing an opportunity to push ahead with talks on the Treaty while "the political climate … at home and abroad [meant] that costs of withdrawal were low", Bush stepped up his attempts to negotiate amendments to the ABM Treaty with Vladimir Putin.[99] To this end, a meeting was arranged with Putin in Shanghai on 22nd October 2001 to discuss what could be done regarding the Treaty, and in a joint press conference it was announced that both leaders *might* be able to work out some changes to its provisions. However when the pair next met in Crawford, Texas, between 14th-16th November, to "hammer out the details", Putin refused to accept the types of changes to the ABM Treaty that Bush was pushing for, while Bush refused continued compliance if the Treaty was not amended. Putin left the meeting threatening to pull out of "all previous arms control deals based round the Treaty" if Bush chose to abrogate it.[100] However, according to Stephen Hadley, much of this had actually been scripted and planned by Bush and Putin, with Bush asking his counterpart how he wanted to respond to US plans to leave the Treaty and saying "how can I do this so that it is not a problem".[101] Bradley Graham later suggested that Secretary of State Colin Powell – who also played a key role in these discussions – considered the abrogation of the ABM Treaty as one of his greatest achievements during his time in office.[102]

Following these meetings, on the 13th December Bush gave Russia formal notice that the US would be abrogating the ABM Treaty. Bush cited Article XV of the agreement which stated that "if extraordinary events related to the subject matter of this treaty have jeopardized its supreme

[99] Lindsay & O'Hanlon (2002) 167
[100] Burns & Brune (2003) 191-3
[101] Interview with Stephen Hadley (26th July 2010). Part of the way that they would do this would be through linking ABM Treaty withdrawal to a new Strategic Offensive Arms Reductions Treaty (SORT) which would be signed on 24th May 2002 – just a few days before the ABM Treaty expired.
[102] Interview with Bradley Graham (11th June 2010)

interests either party may chose to abrogate the Treaty", as justification for his doing so.[103] Under the terms of the agreement, the Treaty would expire in six months time. In a press release, Bush declared that:

> I have concluded that the ABM Treaty hinders our government's ability to develop ways to protect our people from future terrorist or rogue state missile attacks … protecting the American people is my highest priority as Commander in Chief, and I cannot allow the US to remain part of a Treaty that prevents us from developing effective defenses.[104]

The decision took few by surprise and caused only a limited reaction both at home and abroad - even from leading Republicans who had spent the best part of a decade pushing for such a decision.[105] Lt General Henry Obering, soon to be head of the Missile Defense Agency, described the withdrawal from the ABM Treaty as "the single most enabling event" during this period because it "allowed you to integrate different systems, e.g. have different sensors with different launchers, allowing for the possibility of an integrated and layered defence."[106] Vladimir Putin simply responded by saying that he believed the action to be "mistaken" but that he had "complete confidence that Bush's decision present[ed] no threat to the national security of the Russian Federation."[107] Putin's reaction did much to neuter any dissatisfaction amongst America's allies.

Despite these developments, many experts continued to argue that BMD testing and development could be designed to continue within an un-amended ABM Treaty for at least a few more years. In fact, this lack of workable and readily deployable technology had been a key reason why Bush had not pushed ahead with a specific BMD plan, or with amending the ABM Treaty in the first few months of his administration.[108] Philip Coyle and John Rhinelander suggested at the time that:

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[103] "Treaty between the United States of America and the Union of Soviet Socialist Republics on the limitation of anti-ballistic missile systems", Signed by President Richard Nixon and General Secretary Leonid Brezhnev, at Moscow (26th May 1972), entered into force (3rd October 1972)
[104] George W Bush, *"President discusses missile defense",* (13th December 2001)
[105] Graham (2003) 378
[106] Interview with Henry Obering (9th August 2010)
[107] Burns & Brune (2003) 193
[108] Lisbeth Gronlund, "ABM Treaty withdrawal: neither necessary nor prudent", *Arms Control Today,* (Jan/ Feb 2002)

> There will be years of development and developmental testing ahead before the Treaty in the near or medium term raises any obstacles to this work … for the foreseeable future, adequate developmental testing and even some operational testing, can be performed within the Treaties current restraints.[109]

Coyle and Rhinelander went on to suggest that the only thing making ABM Treaty withdrawal necessary was the perceived political value of the deployment of interceptors before the end of Bush's first term in 2004,[110] while renowned physicist Wolfgang Panofsky described the decision as "a political act, not supported by extraordinary events or technological justification".[111] This rationale seemed to be upheld by the reality on the ground, for while three successful tests of the GBI were carried out between July and March 2002, the tests remained "developmental" in nature; none of the tests used realistic decoys - the interceptor missile moved slow enough to decrease stress on the Kill Vehicle (KV), and the intercept point and trajectories of both tests were known prior to launch.[112] Lisbeth Gronlund of the Union of Concerned Scientists argued that "the administration's argument for withdrawal is specious", suggesting that testing of the "SPY" radar, or the construction of new testing facilities in Alaska – both of which would break to the provision of the ABM Treaty - were either "unnecessary or unworkable".[113]

The second controversy was that 9-11 should have any impact on missile defence policy at all, and if anything, should have signalled that the US was spending vast sums of money and concentrating on the wrong type of threat.[114] For many the attacks highlighted the need for the US to concentrate its efforts on protecting against terrorism and not on the more conventional threat from ballistic missiles. Dennis Gormley argued that 9-11 was:

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[109] Philip Coyle & John Rhinelander, "Missile defense and the ABM Treaty: no need to wreck the accord", *World Policy Journal,* 18: 3 (2001) 15-22:16
[110] Ibid 15
[111] Wolfgang Panofsky, "The president's decision to withdraw from the ABM Treaty", *The Eisenhower Institute,* (March 2002)
[112] Lindsay & O'Hanlon (2002) 170
[113] Gronlund (Jan/ Feb 2002)
[114] According to Bradley Graham, "forced to share the stage with the new war on terrorism, missile defense seemed destined to lose some of its prominence". Graham (2003) 376

> Proof that more sophisticated routes to attacking the US homeland – notably long-range ballistic missiles – are far less likely to occur in future than the low tech ones demonstrated so effectively on September 11th.[115]

Such thinking seemed to be confirmed by the National Intelligence Council which – when it released its latest ballistic missile threat estimate in December 2001 – suggested that any new long-range missile threat to the US remained *at least* a decade away.[116] In response to these developments, a Senior Congressional official later quipped that: "the Bush administration wanted to double funding on missile defense, but had no idea of how this money would be spent. Perhaps they would simply begin packing missile tubes with money?"[117]

Bush's decision to abrogate the ABM Treaty appeared to have little correlation with developments in technology and in many respects seemed to go against the lessons drawn from the terrorist attacks of 9-11. Although Bush had vociferously stated his intention to abrogate the Treaty during the first nine months of his administration, both domestic and international political constraints made such a move untenable. 9-11 served as both a catalyst and as a facilitator, temporarily neutering opposition and discontent, and creating a window of opportunity for Bush to press ahead with his BMD programme by abrogating the ABM Treaty.

2002-2004: The push for deployment

During the first few months of 2002, widespread and significant changes were made to the US ballistic missile defence effort. The first action taken by Secretary of Defense Donald Rumsfeld was to rename the Ballistic Missile Defense Organization (BMDO) the Missile Defense Agency (MDA). Although this rebranding was in many ways symbolic – highlighting the Bush administration's desire to move beyond the confines of the Clinton era programme – it also had more structural importance. The MDA, unlike its predecessor, would be granted full agency rank

[115] Gormley (2002) 19
[116] NIE01 (December 2001)
[117] Confidential Interview (B)

and with it, the power and influence associated with such positioning.[118] But perhaps more importantly, it reflected the administration's belief that all missile defence plans should be brought under one large administrative umbrella.[119]

As well as a name change, and elevation in rank, Rumsfeld announced in January 2002 that the Missile Defense Agency's development programme would be granted "special status", which would mean excluding the vast majority of systems under development from the Pentagon-wide Operational Requirements Documents, and from other provisions that might either impede or complicate rapid decisions, progress and deployment.[120] As a corollary Rumsfeld also announced that the majority of programme elements would no longer be required to meet named cost and schedule estimates or formal performance requirements, as they had been forced to in the past.[121] A few months later Rumsfeld declared that the MDA would be adopting special measures to keep information about the US BMD effort secret in order to help the programme proceed expeditiously and to prevent potential adversaries from learning how to overcome or evade the system once deployed.[122] Although this new approach would allow the Pentagon to begin deploying some type of capability very quickly, many detractors and critics - particularly Democrats in Congress - warned that such an approach would seriously undermine and hinder any Congressional attempt at oversight of the programme.[123]

The move to exempt the BMD development programme from many of the normal oversight and testing practices conducted by the Pentagon, was part of the Bush administration's decision to pursue a different kind of technological development model to that which had been used before. Instead of the fly before you buy approach used by the BMDO during the Clinton administration, the MDA was instructed to follow a "capabilities based approach with spiral development"

[118] Essentially, full agency rank meant that the MDA would report directly to the Secretary of Defense and therefore have more power and control within the Pentagon bureaucracy.
[119] Graham (2003) 391
[120] Spinardi (2008) 708
[121] Ibid
[122] Ibid
[123] Steven Hildreth & Gary Pagliano, *"Technical issues and acquisition strategy",* chapter in Steven Hildreth (Eds), *"Current debate on missile defense",* (New York, Novinka Books: 2004) 20-1

model.[124] Under this strategy, a basic version of a weapon (in this case missile defence) could be developed and fielded with the intent of subsequently developing and deploying a more capable version in the future. However, instead of being deployed once fully proven – as in the fly before you buy model – components would be developed, tested, deployed and modified in a cyclical process.[125] Such an approach would allow the Pentagon to begin fielding assets before fully tested, and once these assets were deployed, add to them incrementally as either changes in threat or advances in technology necessitated.[126] In part, this model was adopted because the Bush administration still did not know what type of BMD architecture it wanted or indeed needed, but it was also because it allowed planners to begin fielding rudimentary BMD assets within a very short space of time. In order to fund the vast panoply of BMD programmes under development, the administration requested $7.8b for BMD, which would include $3.6b to develop and deploy the Clinton era "Midcourse Defense Segment" (which would be based on the Ground-Based Interceptor missile), still the most advanced programme under development.[127]

When Pentagon officials outlined the Bush administration's missile defence development plan to Congress in early March 2002, it drew a mixed reception. While the extensive proposals were warmly welcomed by the majority of Republicans, leading Democrats continued to question whether the large BMD budget request might actually be better spent on other more urgent programmes - such as defending against terrorism - and were particularly concerned by the new plans to limit oversight of the development process.[128] Representative Marty Meehan (D-MA) suggested that the Pentagon was "short-changing the war on terror", and was following a "buy first, think later" type of approach, while Senator Jack Reed (D-RI) accused the Pentagon of "dumbing down standards".[129] The Democrat leadership was equally concerned by a January 2002 report by

[124] Ibid 20-2
[125] Ibid
[126] Spinardi (2008) 708
[127] Steven Hildreth, *"Overview",* chapter in Steven Hildreth (Eds), *"Current debate on missile defense",* (New York, Novinka Books: 2004): 79-81
[128] Hildreth & Pagliano (2004) 25
[129] Quoted in Boese (April 2002)

the Congressional Budget Office, which had been requested by former Senate Majority leader Tom Daschle (D-SD), suggesting that the relatively unspecified missile defence plan that the Bush administration was pursuing could potentially cost around $200b over the next two decades.[130]

Nevertheless, in June 2002 after the mandatory six months notice had passed, and the ABM Treaty had expired, the Bush administration wasted little time in beginning construction of the first interceptor silos and assorted military facilities at Fort Greeley, Alaska (ostensibly for testing). Senator John Kyle (R-AZ) welcomed the passing of the Treaty by declaring that the US was "no longer handcuffed to a policy that intentionally leaves its own people defenseless to missile attack", while Democrat Senator Jack Reed (D-RI) called the decision "unwarranted" because many of the concepts remained "many years away".[131] In the House, 30 Democrats and an Independent led by Representative Dennis Kucinich (D-OH) filed a claim to sue the Bush administration for its breach of the ABM Treaty.[132] Nevertheless, by November, Democrats had to settle for a $400m cut and the inclusion of wording that would mandate the Pentagon to share more information about its missile defence plans with Congress, as part of the approval of $7.4b for missile defence in the annual budget.[133] As such, in the words of Robert Joseph, the ABM Treaty "went away with a whimper rather than a bang".[134]

Although reaction to the US withdrawal from the ABM Treaty was relatively muted – partly because Russia announced on the same day that it would reduce its own offensive nuclear forces, which in the words of Robert Joseph "put to bed the myth of the ABM Treaty"[135] – the announcement in December 2002 that assets would begin being deployed by 2004 was far more

[130] "Estimated costs and technical characteristics of selected national missile defense systems", *Congressional Budget Office*, (31st January 2002)
[131] Quoted in Wade Boese, "US withdraws from ABM Treaty; global responses muted", *Arms Control Today*, (July/ August 2002)
[132] Ibid
[133] Hildreth (2004) 79-82; Wade Boese, "Congress authorizes 2003 missile defense funding", *Arms Control Today*, (December 2002)
[134] Interview with Robert Joseph (29th July 2010)
[135] Ibid

contentious. In a speech accompanying National Security Directive (NSD) 23 which outlined the integrated BMD plan, Bush declared:

> Today, I am pleased to announce that we will take another step in countering those [rogue state missile] threats by beginning to field missile defense capabilities to protect the United States as well as our friends and allies … the deployment of missile defenses is an essential element of our broader efforts to transform our defense and deterrence policies and capabilities to meet the new threats we face.[136]

NSD 23 declared it the administration's intention to deploy a BMD system as soon as possible, and began setting out the type of architecture that would be pursued: 10 interceptors were to be placed in Alaska and California by 2004, along with 10 more at Fort Greely (Alaska) by 2005, 15 Aegis ships with up to 20 Standard Missile 3 interceptors would be deployed, and the production of PAC-3 Patriot BMD batteries would also be substantially increased. The Ground-Based Midcourse Defence segment, begun under the Clinton administration, would remain the centrepiece of the system.[137]

The first missile interceptor site in this plan was scheduled for completion by 30th September 2004, just weeks before the presidential election, leading Brookings Institution scholar James Lindsay to suggest that the plan was ultimately underpinned by a political rationale, and by the upcoming 2004 presidential election, because "once you deploy a system you've really stuck a stake in the ground and it makes it very hard for a new administration to undo it. This is irreversible."[138] Although admitting that the 2004 deployment decision was a "high technological risk", one Senior Congressional Official nevertheless remained convinced it was better to have "something rather than nothing" in order to "stay ahead of the threat".[139] Dean Wilkening described the move "primarily as a political ploy, designed to get something in the ground", which as a result "would be a direct reason for all the problems the GBI would experience",[140] and even

[136] George W Bush, *"Presidential directive to deploy missile defenses",* (17th December 2002)
[137] Graham (2003) 387-8
[138] James Lindsay quoted in Burns & Brune (2003) 210; Graham (2003) 382-3
[139] Confidential Interview (D)
[140] Interview with Dean Wilkening (9th July 2010)

Baker Spring – a foremost advocate of BMD - suggested that "there was a big opportunity cost of early deployment."[141]

With 9-11 still dominating public discourse, the 2002 Congressional midterm elections were fought over issues to do with defence and foreign policy, and this resulted in support for the president and the return to power in the Senate of the Republicans – giving them control of both Houses. The new Republican controlled Congress remained committed, as they had been for nearly a decade, to rapid BMD deployment, and vowed not to stand in the way of the Bush administration.[142] The result significantly eroded the power of the Democrats to influence BMD policy, and would leave them largely powerless for the next two years as the Bush administration pushed ahead with its plans. Realising that the debate was essentially no longer about an ideological struggle over arms control, but about practicality, performance and cost of various missile defence programmes, the Democrats shifted strategy.[143] Instead of trying to prevent or limit missile defence deployment, more emphasis would now be placed on writing language into the annual defence Bills that would require the Pentagon and the MDA to provide regular cost estimates, performance criterion and test schedules.[144]

In summer 2003, the Missile Defense Agency outlined how the US missile defence system would be fielded. The plan would include five incremental blocks to deal with certain threats that the MDA expected to face over in the near future. (1) The first concern was to protect against a North Korean long-range missile threat, because Pyongyang was perceived to be moving fastest on WMD; (2) the second concern was to protect US forces in the region against North Korean short and medium range threats; (3) third, to protect against the growing threat from Iran; (4) fourth, to expand this coverage to Europe; and (5) to enhance overall coverage of both Europe and East

[141] Interview with Baker Spring (30th June 2010)
[142] Confidential Interview (D)
[143] Confidential Interview (A)
[144] Ibid

Asia.[145] To achieve this aim Bush asked Congress for $9.1b in February 2003 for missile defence, $1.3b more than the previous year's request, and $1.5b more than had been appropriated for FY 2003.[146]

According to Missile Defense Agency Director Henry Obering (July 2004 - November 2008) the decision to begin fielding assets in summer 2004 – and to exempt the BMD programme from certain testing procedures and oversight – was justified because "when you don't have anything there in the first place, it demands a different set of rules".[147] Obering pointed to three main reasons why the administration decided to begin fielding assets in 2004; (1) there was enough "testing successes under our belt to know we had a capability"; (2) "we didn't have anything already", and; (3) "we could make changes as and when we need to".[148] He went on to defend the spiral development model by saying "in a software intensive environment you couldn't use normal development processes because by the time you fielded a capability the requirements had changed, causing you to field obsolete stuff".[149]

However, evidence continued to suggest that the technology required for a comprehensive missile defence system remained developmental in nature. In November 2001 for example, General John Holly, the Midcourse Defense programme manager, had announced that the Missile Defense Agency would be postponing testing of the Ground-Based Interceptor (GBI) missile until the autumn of 2003, so that more focus could be put on developing the launcher.[150] The announcement also came just days after the GBI system had failed its latest developmental test, and meant that there would be no more tests of the integrated BMD system until the end of 2004, two years later, and after the system had already started to be deployed.[151] In light of these developments, leading Democrats successfully managed to include legislation in the fiscal year 2004 Defence

[145] Interview with Henry Obering (9th August 2010)
[146] Hildreth (2004) 80-1
[147] Interview with Henry Obering (9th August 2010)
[148] Ibid
[149] Ibid
[150] Graham (2003) 394
[151] Burns & Brune (2003) 211

Authorization Bill mandating that Thomas Christie, Director of the Pentagon Operation Test and Evaluation (OTE) oversight office, make regular assessments and reports to Congress on the BMD programme.[152] Nevertheless, with the Republican Party now firmly in control of both Houses of Congress, the Bush administration's $9.1b missile defence budget request for fiscal year 2004 passed through Congress with little problem.[153] By July 2003 both Houses had agreed to match Bush's request, although emphasising funding for programmes that were more likely to be deployed in the near term, and in October just $5m less than had been requested for missile defence was authorised by Congress.[154]

The Democrat leadership launched, in their own words, their "largest offensive against Bush's missile defence plans" in the Senate in 2004, and endeavoured to press Bush to refocus spending away from the more exotic and infant BMD technologies towards more near-term and proven ones.[155] In April 2004, it seemed that the Democrats might be aided in this push by realities on the ground, as a report from the US General Accounting Office strongly warned against early deployment:

> Testing in 2003 did little to demonstrate the predicted effectiveness of the system's capability to defeat ballistic missiles as an integrated system … As a result of testing shortfalls and the limited time available to test the BMDS being fielded, system effectiveness will be largely unproven when the initial capability goes on alert at the end of September 2004.[156]

The GAO report was followed a month later by a report by the Union of Concerned Scientists (UCS) which voiced further concern:

[152] Graham (2003) 393; Boese (December 2002)
[153] The request consisted of $7.7b for the Missile Defense Agency directly, and $1.4b to buy Patriot PAC-3 batteries
[154] Wade Boese, "Missile defense funding eases through Congress", *Arms Control Today,* (March 2003); Wade Boese, "Congress grants administration the full $9.1bn for missile defense", *Arms Control Today,* (October 2003)
[155] Wade Boese, "Congress backs Bush's defense budget", *Arms Control Today,* (July/ August 2004)
[156] "Missile defense: actions needed to enhance testing and accountability", *US General Accounting Office*, (23rd April 2004)

> The ballistic missile defense system that the United States will deploy later this year will have no demonstrated defensive capability and will be ineffective against a real attack by long-range missiles.[157]

The UCS Report went on to argue that "there is no technical justification for deployment of the system" and that "deployment should be halted and Congress should require that the system undergo operationally realistic testing before it is deployed".[158] The UCS also derided the Bush administration's claims that the system would be reliable as "irresponsible exaggerations".[159]

Nevertheless, all three significant Democratic amendments to the administration's BMD budget during 2004 would fail; first, Senator Barbara Boxer's (D-CO) proposal to require that interceptors undergo operational testing before being fielded; second, Senator Jack Reed's (D-RI) proposal that the Pentagon develop an operational testing plan and establish cost and performance baselines for the system, and thirdly, Senator Carl Levin's (D-MI) proposal to cap deployment at the 20 interceptors already planned and to reallocate the funds to other non-proliferation and anti-terrorism programmes. Levin went on to argue that: "If we want a missile defense that works rather than one that sits on the ground and soaks up money, we should not shy away from realistic testing requirements".[160] As a result, the Democrats were unable to prevent the Bush Administration's drive for deployment, and could not stop the Pentagon from placing the first GBI interceptor missile in its silo at the missile defence site at Fort Greely, Alaska on 22nd July 2004.

Democrats and Republicans would continue to fight over the future of the US ballistic missile defence programme during the summer's presidential election race, with Senator John Kerry (D-MA) keen to limit the system, and Republican incumbent George W. Bush determined to push ahead. By the time that Bush was declared the winner of the 2004 election, the US had already begun deploying assets of its proposed global missile defence system. In fact, the deployment would rise to six interceptor missiles at Fort Greeley, Alaska as well as two at Vandenberg Air Force Base, California by December 2004. As a result, by the end of this period the US possessed a

[157] Gronlund et al (May 2004)
[158] Ibid
[159] Ibid
[160] Boese (July/ August 2004)

nascent missile defence system with the theoretical capability of combating a limited and rudimentary enemy missile attack.

Between January 2002 and September 2004 the US ballistic missile defence programme evolved and expanded with great rapidity. However, this rapid development and expansion had relatively little to do with major advances in technology or with developments in the ballistic missile threat. Indeed, Lt General Obering later remarked that the programme was "not based solely on threat but on what we were actually able to do."[161] Instead, policy appeared to be driven by the worldview and policy priorities of the Bush administration, and by the new approach to BMD technology development, both of which were allowed to flourish under a Republican controlled Congress, and in the post-9-11 environment. In sum, according to Steven Miller, the Bush administration:

> Wished to bequeath to the winner of the 2004 presidential election a world in which the ABM Treaty ha[d] been left behind … and initial missile defence deployments ha[d] occurred.[162]

(3) Assessing the drivers of policy, 2001-2005

Neither pressures arising from the international system, nor advances in technological capabilities can explain the great rapidity with which the Bush administration sought to forge ahead with BMD during this period. Although the terrorist attacks of 9/11 were an important component of the story, to understand why policy evolved in the manner that it did, a fuller examination of the pressure brought to bear on policy by president and Congress must be included. It is only by looking at the thinking and actions of the Bush administration in particular, that a full understanding of why the US abrogated the ABM Treaty, and had begun deploying assets of a national missile defence system by 2004, can be obtained.

[161] Interview with Henry Obering (9th August 2010)
[162] Steven Miller, "The flawed case for missile defence", *Survival*, 43:3 (2001) pp95-109: 95

International and technological factors

International pressures on policymaking between 2001 and 2005 can to an extent explain why George W. Bush was able to push ahead so precipitously with missile defence. North Korea's decision to expel IAEA weapons inspectors, leave the Nuclear Non-proliferation Treaty and resume its uranium enrichment programme, combined with the revelation that Iran had been secretly developing its own nuclear weapons programme, certainly explain why policymakers became more concerned about the growing missile threat to US security. Moreover, it is equally arguable that these concerns were compounded by the 9/11 terrorist attacks on New York and Washington DC.

However, most analysts continued to agree that a genuine new missile threat to the US homeland remained years away, and that the terrorist attacks of 9-11 appeared to suggest that more focus needed to be placed on combating terrorism, not ballistic missiles.[163] Moreover, the types of BMD systems requested by the US military – in light of Operation Iraqi Freedom in 2003 – were predominantly weapons that had little if anything in common with the far more complex GBI system that the Bush administration was intent on deploying by 2004. As such, international pressures and developments do not explain the particular decisions taken by the Bush administration during this period, especially the drive to deploy a system by 2004, and to exempt these assets from standard testing procedures.

Some of these questions can be addressed by looking at technology, or more specifically, by examining the technological development and deployment model adopted by the Bush administration in 2002. While it is true that the technical capability of various systems under development increased during this period, in many respects the spiral development model essentially papered over the cracks in BMD technology. The result was that commentators and lawmakers already sceptical of Bush's plans, questioned whether what had been deployed would

[163] In fact, one Senior official later remarked that "if anything 9-11 should have aided Senator Carl Levin and the Democrat's push to redirect defence funding towards counter-terrorism". Confidential interview (A).

actually work, and whether such deployments were really worth the political and financial costs.[164] A key reason for this was the lack of testing. In fact, full testing of the system was suspended in 2002, which meant that the programme came nowhere near the amount of tests recommended during the Clinton administration. This scepticism was equally unaided by the decision to classify far more of the information arising from the testing programme, and by limiting Congressional oversight of the Missile Defense Agency. A fuller understanding of why this strategy was pursued during this period can therefore only be obtained through an examination of the domestic political influences that underpinned it.

Domestic factors

In terms of domestic influences on policy, the most important driver of the US missile defence programme during this period was the Bush administration. The actions, thinking and worldview of George W. Bush and those around him, explain why policy forged ahead so rapidly between 2001 and 2005, despite the absence of any immediate strategic or technological reason to do so. It was Bush's more pessimistic understanding of the post Cold War world, combined with a belief – exacerbated by 9-11 – that the ABM Treaty was an anachronism which prevented the US from deploying the missile defences it needed, that provided the impetus to abrogate the Treaty. Moreover, it was this different view of the international environment, coupled with the abrogation of the ABM Treaty, which led to the rapid development and deployment of BMD assets during this period. Finally, Bush and those around him placed such importance on BMD because they were far more sceptical of the continued validity of nuclear deterrence in the face of new rogue and terrorist threats, and because they were far less convinced about the wisdom of ensuring US security through mutual vulnerability and the ABM Treaty, than the Clinton administration. While this represented

[164] Graham Spinardi argued that "the system went ahead without the system being validated by flight tests" and therefore that "Bush's desire for quick deployment may have undermined the system technologically". Spinardi (2008) 714

the central importance of the Bush administration as a *domestic political actor*, the desire to entrench the system politically through rapid deployments and to ensure its survival after 2005, were certainly driven in part by *domestic political reasons.*

However, to understand why policy stalled during much of 2001, and then expanded rapidly thereafter, such analysis must take into account the pressure brought to bear on policy by Congress. Congressional pressure essentially evolved in three distinct parts. Firstly, between January and September 2001, Democrats appeared determined to fight against Bush's BMD plans, and this was aided considerably by the defection of Senator Jim Jeffords in mid-summer. Second, was the relaxation of pressure from Democrats following the terrorist strikes of September 11th 2001, which allowed Bush to push ahead and abrogate the ABM Treaty with relatively little resistance. Lastly, was the period between 2002 and 2005 where Democrats were forced to shift policy following the abrogation of the ABM Treaty, and during which time Republican control of Congress essentially neutered Congressional pressure on policy. This period then provides a clear example of how the evolution of the missile defence debate in Congress – driven and shaped to a large extent by the actions of the Bush administration – fundamentally altered the type of pressure Congress was able to exert on policy. Consequently, although pressure remained bifurcated along partisan lines in 2005, the parameters of the type of pressure Congress could exert had shifted fundamentally. In this sense, the party in control of Congress was central to the ability of Bush to drive policy forward.

Conclusion

The US ballistic missile defence programme expanded considerably during George W. Bush's first term in office; funding was doubled, the ABM Treaty was abrogated, and assets were deployed to defend the US homeland. As a result, the contours of the US missile defence debate shifted considerably, leading Senator Carl Levin to declare in 2003 that: "the debate over whether to

deploy a nationwide antimissile system is over. Bush has decided the matter."[165] Politically, the missile defence debate shifted from disagreements over how, what and whether to deploy, to a new basis around ensuring that what was deployed had been properly tested and was cost-effective. The period 2001-2005 therefore represents a significant transition in the evolution of missile defence policy, but not one that is necessarily out-of-sync with what had gone before.

This shift in policy was primarily the result of the Bush administration, and in particular the determination of Bush and those around him to push ahead with BMD development and deployment. But it was also facilitated by the 9/11 terrorist attacks – which created a political window of opportunity – and by the relatively muted pressure that Democratic lawmakers were able to exert on policy, especially after 2001. It was the worldview and willpower of the Bush administration that led to the abrogation of the ABM Treaty and early deployment in 2004, rather than any specific international or technological push. That said, both Iran and North Korea made progress in their respective WMD programmes during this period, and advances were made in the technology needed for deployment. Nevertheless, the discord between these developments and policy must be understood as a product of the Bush administration, and especially the spiral development deployment plan adopted after 2002.

Bush's successful bid for re-election in late 2004 suggested that the programme would continue to be driven forward, and that more assets would be deployed. Moreover, although it appeared that the domestic debate would now shift to oversight and scrutiny of testing, it seemed likely that the programme would flourish during Bush's second term, and make further significant strides towards entrenching BMD as a key component of US security. However, even though the Missile Defense Agency had deployed eight long-range interceptor missiles by the end of Bush's first term, debate continued to rage about the actual capability of the system.

[165] Quoted in Graham (2003) 393

Expanding and Integrating the US Missile Defence Programme, (2005-2009)

George W. Bush began his second term, much as he had the first, determined to push ahead with ballistic missile defence. Bush and those around him remained convinced that missile defences were an integral component of US security policy, and that assets should be deployed as soon as possible in order to address what they believed was the growing short, medium and long-range missile threat from Iran and North Korea. In light of this, the Bush administration continued to favour the deployment of assets before they had been fully tested, maintained funding for the programme at around $10b per year, and appeared relatively unconcerned about the impact of such moves on Russia. With Republicans in control of Congress during the first two years of this period, and both Iran and North Korea augmenting their WMD programmes, Bush looked set to firmly entrench BMD both tangibly and politically over the next four years.

Between 2005 and 2009, the Bush administration forged ahead with BMD, deploying more assets and retaining high levels of funding, and in 2006, began formal negotiations about expanding the system to Europe. Debate about the Third Site in Europe would become one of the defining features of this period, as for two years Democrats and BMD sceptics strove to ensure that the deployments were based on proven technologies, and that they did not undermine wider US security interests, particularly relations with Russia. While the US missile defence programme pushed ahead relatively unhindered during the first two years of this period, the return to power in Congress of the Democrats at mid-term ensured that the Bush administration would not be able to forge ahead entirely – especially with the proposed Third Site missile defence plan for Europe. Nevertheless, as Bush left office, the US ballistic missile defence effort had been transformed, and appeared to be an accepted and entrenched component of national security policy.

The result is that missile defence policy during Bush's second term in office raises several interesting questions. First, why was Bush able to push ahead with deployments, and with negotiations about expanding the system to Europe, despite continuing problems with technology? Second, why did the Bush administration pay so little attention to Russian concerns and threats about US BMD plans? Third, why were long-range and strategic missile defence systems apparently prioritised during this period, despite the prevailing trend in the missile threat towards regional and short-range WMD proliferation?

(1) Competing pressures on BMD policy, 2005-2009

As Bush began his second term in January 2005, BMD policy remained subjected to two key systemic pressures: the rogue state WMD threat from Iran and North Korea, and the growing anxiety in Russia about US BMD plans. At the same time, and despite the spiral development and deployment model, BMD technology continued to be complicated by technological problems, and considerable debate remained about whether what had already been deployed would work. However, with Republicans retaining control of both Houses of Congress, Bush seemed well placed to push ahead with a variety of missile defence systems between 2005 and 2009.

International pressures on policymaking

In early 2005, international pressure on policy was split. On one hand, neither North Korea nor Iran appeared to be relenting in their pursuit of WMD, but experts remained split over the trajectory, capability and extent of these programmes, and what they meant for US security.[677] On the other, was the growing Russian concern about BMD plans, which would become more and more

[677] See Litwak (2008)

vociferous during this period, especially as the US looked to push ahead with the Third Site plan after 2006.

The suspected WMD programmes in North Korea and Iran continued to dominate the BMD debate during this period. In 2005, for example, newly elected Iranian President Mahmoud Amadinejad began a comprehensive programme of missile tests, and in 2006, announced that Iran had successfully enriched uranium.[678] Equally troubling was the fact that North Korea also continued to augment its WMD programmes, especially after it conducted its first nuclear test in August 2006.[679] Nevertheless, opinion remained divided about the extent of these programmes, especially after the National Intelligence Council released an estimate in November 2007 suggesting that Iran had halted its nuclear weapons programmes in 2003, and was "less determined to develop nuclear weapons than we have been judging since 2005".[680] Mohamed ElBaradei – head of the IAEA – also publicly declared that he had not seen evidence of Iran developing nuclear weapons.[681] Joseph Cirincione went as far as to argue that with large reductions in Russian and Chinese long-range weapons over the last decade, the missile threat to the US was actually decreasing.[682]

The second important international dynamic during this period was the growing concern in Russia about US BMD plans, especially the proposed Third Site in Central and Eastern Europe. In fact, in response to the announcement of the plan to deploy US missile defence assets in Europe in 2007, Russian officials threatened to suspend compliance with the Conventional Forces Europe (CFE) Treaty, leave the 1987 Intermediate-range Nuclear Forces Treaty (INF), target missiles at

[678] See Robert Litwak, "Living with ambiguity: nuclear deals with Iran and North Korea", *Survival*, 50:1 (2008) pp91-118
[679] See Scott Synder, "Responses to North Korea's nuclear test: capitulation or collective action?", *The Washington Quarterly*, 30:4 (2007), pp33-43
[680] "Iran: nuclear intentions and capabilities", *US National Intelligence Council*, (November 2007)
[681] *International Herald Tribune* (28th October 2007)
[682] Joseph Cirincione, "The incredible shrinking missile threat", *Foreign Policy*, (May/ June 2008), pp68-70. Cirincione went on to say this was because, "As of 2007 there are fewer missiles, missile programs, and hostile states with missiles armed at the US and its armed forces than 20 years ago" and because "the number of countries seeking to develop ballistic missiles is falling".

Poland and the Czech Republic, and even to re-deploy Russian nuclear weapons in Cuba.[683] Although Bush administration officials attempted to engage and reassure Moscow about US plans, the rift caused by US missile defence looked likely to impact upon the wider US security agenda. Russian antagonism was exacerbated during this period by the gradual loss of post-9-11 sympathy for the US in the wake of the wars in Afghanistan and Iraq.

Nevertheless, abrogating the ABM Treaty and deploying BMD assets had not caused the international instability that many had feared it would.[684] In fact, attitudes towards BMD amongst US allies became increasingly more favourable between 2005 and 2009.[685] In April 2008, for example, NATO leaders agreed to endorse US plans for missile defence in Europe, and would begin discussions of how this could be integrated with current regional assets. The same would be true for US allies in the Middle East and East Asia, who also appeared keen to work with the US to address their own growing regional missile concerns. National Security Advisor Stephen Hadley later declared that NATO acceptance of the plan in April 2008 meant that: "the debate [over missile defence had] ended".[686]

Technological pressures on policymaking

Questions about the technological capability of what was being developed and deployed continued to surround the US ballistic missile defence programme between 2005 and 2009. In fact, many components of the nascent system deployed in 2004 continued to fail important development tests,

[683] See Stephen Cimbala, "Going ballistic over missile defenses: what matters and why," *The Journal of Slavic Military Studies*, 20:4 (2007), pp449-473
[684] One of the greatest concerns of arms control advocates was the abrogating the ABM Treaty would lead to a new offense-defence nuclear arms between the US and Russia, and possibly China. See Ivanov (2000)
[685] For more on this see Bernd Kubbig, "Special issue: the domestic politics of missile defense", *Contemporary Security Policy*, 26:3 (2005)
[686] See Steven Erlanger & Steven Lee Myers, "NATO endorses Europe missile shield", *New York Times*, (4th April 2008)

an even the better performing programmes under development continued to split opinion about their capability under "real world conditions".[687]

While questions remained about many technologies under development, the main sources of concern were the Ground-Based Midcourse Defense Segment, and the spiral development deployment model. As the General Accounting Office warned in 2006:

> Spiral development has allowed the GMD program to concurrently mature technology, complete design activities, and produce and field assets before end-to-end testing of the system – all at the expense of cost, quality, and performance goals.[688]

And that:

> Programs consistently move forward with unrealistic cost and schedule estimates, use immature technologies in launching product development, and fail to solidify design and manufacturing processes at appropriate points of development.[689]

Concerns about the system were compounded by the fact that the new 2-stage interceptor missile to be deployed in Europe would be based on this design. However, and although this report, and others, cast doubt on the capability of the system currently deployed in Alaska and California, Missile Defense Agency Director Henry Obering would later remark that "many leading figures in the Bush administration believed that the interceptors deployed in Alaska and California would have been able to intercept any missile that threatened the US homeland".[690]

The result was that technological pressure on policy between 2005 and 2009 remained complicated, with many commentators and scientists questioning the efficacy of what was being deployed. On one side, the Bush administration professed that the system they started deploying in 2004 was capable of intercepting a rudimentary North Korean missile, while on the other, many sceptics suggested that the GBI had not even proven itself in developmental testing. Although the MDA made great strides during this period on a number of different BMD technologies, whether

[687] See Victoria Samson, "Spiralling out of control: how missile defense's acquisition strategy is setting a dangerous precedent", *Defense & Security Analysis*, 24:2 (2008) pp203-211
[688] "Missile Defense Agency fields initial capability but falls short of original goals", *US General Accounting Office*, (15th March 2006)
[689] "Assessment of selected major weapons programmes", *US General Accounting Office*, (31st March 2006)
[690] Interview with Henry Obering (9th August 2010)

this progress was enough to justify deployment and expansion of the system to Europe therefore remained difficult to gage.[691]

Presidential policy agenda

At the start of his second term, Bush remained committed to deploying a comprehensive ballistic missile defence system, both in order to stay ahead of the threat and to ensure that BMD became established as a norm of US national security thinking. The president and those around him continued to view BMD as a central response to the growing WMD threats from Iran and North Korea, and remained keen to pursue a significant expansion of US missile defence capabilities, despite strong concern from Moscow.[692] Moreover, Bush also reaffirmed his commitment to the spiral development deployment process, and his belief that having something deployed was better than nothing.

The centrepiece of Bush's second term BMD plan would be the determination to place further assets of the integrated BMD system in Europe, which the Bush administration declared was necessary to "provide a defense of Europe against a limited intermediate and long-range ballistic missile threat from the Middle East and providing additional capability to the US".[693] Missile Defense Agency Director Lt General Henry Obering elaborated:

> We are concerned about threats that may emerge from the Middle East. Having another interceptor site in Europe would greatly [complicate] not only an attacker's problem with respect to the United States in terms of how many interceptor sites they have to deal with, but it also primarily provides coverage to our allies and friends.[694]

The Third Site plan would involve placing 10 new two-stage long-range interceptor missiles at the Rezikowo Air Force Base in Poland, and large radar in the Brdy Military Zone in the Czech

[691] See Lewis & Postol (May/June 2008)
[692] See Walt Slocombe, "Europe, Russia and American missile defence", *Survival*, 50:2 (2008), pp19-24
[693] Philip Coyle & Victoria Samson, "Missile defense malfunction: why the proposed US missile defenses will not work", *Ethics and International Affairs*, 22:1 (2008), pp3-23: 15
[694] Wade Boese & Miles Pomper, "Defending missile defence: an interview with Missile Defense Agency director Lt. Gen. Henry Obering", *Arms Control Today*, (November 2005)

Republic.[695] According to Undersecretary of Defense for Policy Eric Edelman, the Bush administration also saw the plan as able to compliment and offer a "bolt on capability" to a future NATO missile defence system.[696]

The priority placed on expanding and integrating the US ballistic missile defence system remained driven in part by Bush's worldview, and partly by the concern within the administration about Iran and North Korea.[697] But it was also a product of the administration's decision to pay more attention to rogue state threats, rather than to great power politics with nations like Russia, and thus continue to shift US national security thinking away from a Cold War mindset. In addition to this, Bush's desire for early deployment was undoubtedly driven by a strong desire to entrench the system politically, and therefore to ensure its status after he left office.[698]

Congressional pressure on policymaking

With the Republican Party retaining control of both Houses of Congress in the 2004 elections, it seemed unlikely that much pressure would be exerted on Bush's BMD plans. In fact, with Republicans controlling both the executive and legislature during 2005 and 2006, the Bush administration was able to push ahead and further entrench many of the programmes begun between 2001 and 2005. The result was that by the end of 2006, the BMD debate had shifted considerably, and Democrats had little choice but to accept the fact that the debate could no longer be strictly about placing interceptors in silos.[699]

However, after the Democratic Party regained control of the Senate in late 2006, the stage was set for a new battle over expanding the system to Europe and augmenting the system already

[695] George Lewis & Theodore Postol, "The European missile defense folly", *Bulletin of the Atomic Scientists,* 64:2 (2008), pp32-39: 33
[696] Interview with Eric Edelman (20th July 2010). In fact, according to Edelman, it would have been easier for the Bush administration to have the third site on the East Coast of the USA, but moving the deployments to Europe offered the added advantage of keeping US and European defence "coupled", particularly within NATO.
[697] Confidential interview (D)
[698] Confidential Interview (E)
[699] Confidential interview (B)

deployed in Alaska and California. Although Democrats were not against the idea of expanding the system to provide additional protection for the US and its allies in Europe against the threat from Iran, lawmakers strove to ensure that such decisions were based on credible technology.[700] What is more, Democrats also pushed to synchronise deployments more directly with what was happening in Iran and North Korea, and to attempted to push BMD funding and development towards TMD and battlefield technologies and away from those considered more futuristic.[701] As such, Democrats fought to include language in the annual appropriation Bill's linking funding for BMD to more rigorous testing and oversight of the assets designated for deployment.[702] In doing this, Congress was able to constrain the plans of the Bush administration during 2007 and 2008.

The return of Democratic control of Congress effectively put the brakes on the Bush administration's BMD plans, especially the proposed deployments in Central and Eastern Europe. That said, by 2007 and 2008, the BMD debate had essentially moved to a position whereby disagreements in Congress were more about the most effective way of deploying, rather than about whether or not to deploy, and the debate was now shaped by the deployments that had already been made. In this sense, Congressional pressure on policy was limited to the scale and timing of further BMD deployments, rather than whether or not the US should continue to augment the assets already deployed. This was a direct reflection of how much the contours of the debate in Congress had changed during Bush's presidency.

(2) The evolution of policy, 2005-2009

Great strides forward had been made in the US ballistic missile defence programme during Bush's first term in office, and the BMD debate had shifted accordingly. Although many commentators and scientists continued to question the technological development and deployment programme, by

[700] Burns (2010) 93
[701] Ibid
[702] Ibid

2005 most interested parties had come to accept a role for BMD in US national security policy. With Bush determined to push ahead and to deploy more assets of this nascent integrated missile defence system both at home and abroad, the main debate looked likely to be fought over the pace and type of further deployments, and not over the notion of missile defence itself.

2005 and 2006: Entrenchment and expansion

At the beginning of 2004, all major presidential candidates held slightly different views about missile defence.[703] Incumbent Republican President George W. Bush remained staunchly committed to deploying more components of his multi-layered BMD system, and made it clear during his re-election campaign that he considered the programme essential for US security.[704] Democrat candidates Senator John Kerry (D-MA) - who had opposed the decision the withdraw from the ABM treaty in late 2001 – and Senator John Edwards (D-NC), remained theoretically in favour of further missile defence testing and development, but did not consider the threat sufficient to warrant the type of plan Bush was proposing.[705] Both referred to Bush's BMD drive as "the wrong priority" during the election campaign, and together called for diverting money from the "untested missile defense system" to pay for other priorities such as expanding the US military.[706] As a result, it seemed likely that a Bush victory would mean that BMD would progress at a significant speed through the next four years, whereas if John Kerry or John Edwards won, funding would be slashed, no more "untested" interceptors would be placed in silos, and the system would not become operational until it was technologically proven. Duncan Currie suggested at the time

[703] See Wade Boese, "Special section: 2004 candidate profiles", *Arms Control Today*, (January/ February 2004)
[704] Ibid
[705] Cailtin Baczuk & Rebecca Schauer, *"Ballistic missile defense in Northeast Asia: an annotated chronology: 1990-present",* (Monterey, Center for non-proliferation studies: 16th February 2004)
[706] Duncan Currie, "Star wars and the Senator: John Kerry's' dovish record on missile defense", *The Weekly Standard*, (30th August 2004)

that it was "no exaggeration to say the future of national missile defense hinges on November's presidential election".[707]

During the election, Bush strongly criticised "those who oppose this ballistic missile defense system" as people who "really don't understand the threats of the 21st century" and who were "living in the past."[708] As a result, his election victory ensured that the BMD programme would remain at the forefront of US politics for the next four years as the president looked to spend the "political capital" he had gained from the election.[709] In early 2005 Henry Obering reiterated and expanded upon the administration's belief in a speech to Congress accompanying the annual BMD budget request:

> The threat we face from proliferating and evolving ballistic missile systems and associated technologies and expertise continues unabated. There were nearly 100 foreign ballistic missile launches around the world in 2004. This is nearly double the number conducted in 2003 and slightly greater than the number of launches in 2002. More than 60 launches last year involved short-range ballistic missiles, over ten involved medium-range missiles, and nearly twenty involved land- and sea-based long-range ballistic missiles.[710]

As such, rather than developing BMD to address particular types of missile threat during this period, Bush's BMD programme remained driven and underpinned by a more general desire to develop and deploy a substantial "missile defence capability" as soon as possible. According to Obering:

> The Missile Defense Agency's mission remains one of developing and incrementally fielding a joint, integrated, and multilayered Ballistic Missile Defense System to defend the United States, our deployed forces, and our allies and friends against ballistic missiles of all ranges by engaging them in the boost, midcourse, and terminal phases of flight.[711]

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[707] Ibid
[708] Quoted in David Halbfinger, "The 2004 campaign: the president; Bush promotes his plan for missile defense system", *New York Times*, (18th August 2004)
[709] George W Bush *"President Holds Press Conference",* White House Office of the Press Secretary, (4th November 2004). Nevertheless, missile defence would also share the stage with the president's other priorities, most notably Iraq, Afghanistan and the war on terrorism. As Bush remarked, "I've earned capital in this election - and I'm going to spend it for what I told the people I'd spend it on, which is - you've heard the agenda: Social Security and tax reform, moving this economy forward, education, fighting and winning the war on terror".
[710] Lieutenant General Henry A. Obering III, USAF Director, Missile Defense Agency Missile Defense Program and Fiscal Year 2006 Budget (Spring 2005)
[711] Ibid

In March 2005, Obering commented that the programme remained "structured to balance the early fielding of elements of this system with its continued steady improvement through an evolutionary development and test approach".[712] The centrality to the Bush administration's thinking was reflected in the fiscal year 2006 defence budget, in which the Missile Defense Agency requested $7.8b; a large percentage of which would be directed towards systems designed to counter the perceived growing Iranian and North Korean threats. Of particular note, in a direct reflection of the administration's concern about Iran, $10m was set aside to scout for a location for a Ground Based Interceptor site in Europe, while officials stepped up talks with the Czech Republic, Hungary and Poland about the possibility of housing the long-range interceptors on their territory.[713]

Following a two-year hiatus, and after several missile defence interceptors had already been installed at Fort Greeley, Alaska and at Vandenberg Air Force Base, California, testing of the Ground-Based Midcourse Defense system resumed in December 2004. The first test would result in a failure when the kill-vehicle and the booster missile failed to separate, and the second, conducted just a few days later, was also unsuccessful, owing to the interceptor failing to launch due to a software configuration problem. Two months later in yet another test of the GBI, on the 14th February 2005, the interceptor again failed to launch, this time due to the silo support arm failing to retract.[714] After the latest test failure, the Pentagon convened an independent review panel to look into these problems.[715] The findings of the panel that were presented to the Director of the Missile Defense Agency in March 2005, recommended that the programme should enter a "performance and reliability verification phase" whereby mission assurance must become the highest priority. It also candidly noted that

[712] Ibid
[713] Wade Boese, "Ground-based interceptor fails again", *Arms Control Today*, (May 2005)
[714] "Ballistic Missile Defense Flight Test Record", *US Missile Defense Agency*, (11th June 2011)
[715] The panel consisted of William Graham – former head of NASA, General Willie Nance – head of the Pentagon's Ground-Based Midcourse Defense programme in the late 1990s, and William Ballhaus Jr. – leader of the Aerospace Corporation.

> With the focus on rapid deployment of the Ground-Based Midcourse Defense system, there was not always adequate opportunity to fully ground test the system prior to each flight attempt.[716]

The authors also warned that the Missile Defense Agency had taken "dangerous shortcuts" in its attempts to get the system running, by "launching tests without even being sure that all parts were working".[717] Another panel commissioned by the Pentagon, concluded that the rush to deploy national anti-missile defences in 2004 had led to "shortfalls in quality controls and engineering procedures" because the Missile Defense Agency had been trying to meet a political deadline, which put "schedule ahead of performance and testing".[718] It also noted that the "decision to press ahead with the antimissile system in the face of production and testing delays had come at considerable costs in assurances of its reliability".[719] Senator Hillary Clinton (D-NY) quipped that it was "a little odd that we would deploy a system that hasn't succeeded and expect that to serve as a deterrent".[720] Nevertheless, in March 2005 - as the Missile Defense Agency began installing a further 10 interceptors at Fort Greely, Alaska - General John Holly, head of the Ground-Based Missile Defense programme, publicly announced that despite the recent consecutive test failures, and while the system had not been officially declared operational, it did have "an emergency capability that could be switched on at any time that could stop a relatively unsophisticated attack from North Korea".[721]

Although Democrats remained keen to scrutinise and curb what they perceived to be the excesses of Bush's BMD programme, they were able to make only relatively little impact on the fiscal year 2006 budget. A major reason for this was the developments in Iran and North Korea during 2005. In February 2005 for example, Pyongyang publicly declared that it had acquired the technology required to produce nuclear weapons, while in August, the election of Mahmoud

[716] "Independent Review Team Findings and Recommendations", Presented to the Director, US Missile Defense Agency, (31st March 2005)
[717] Joshua Kurlantzick, "Shots in the dark; you may have forgotten missile defense, but Rumsfeld hasn't", *The American Prospect*, (December 2005)
[718] Bradley Graham, "Panel faults tactics in rush to install anti-missile system", *The Washington Post*, (10th June 2005)
[719] Ibid
[720] Quoted in Wade Boese, "Ground-based interceptor fails again", *Arms Control Today*, (May 2005)
[721] Matt Voltz, "General: missile system could stop North Korean attack today", *The Associated Press*, (15th March 2005)

Amadinejad in Iran, and his rejection of EU-led diplomatic efforts to curb the Iranian uranium enrichment programme, appeared equally troubling.[722] The result was that both nations appeared to be moving inexorably closer to acquiring significant WMD capabilities, but not necessarily to acquiring Intercontinental Ballistic Missiles (ICBM's) capable of striking the US homeland.

Despite being in the minority, Democrats began 2006 determined to curb what they perceived to be the excesses of the Bush administration's BMD programme, by cutting funding for "futuristic" programmes and by attempting to make sure anything deployed had been "properly tested."[723] Democrats were especially concerned about reports from the Congressional Budget Office suggesting that missile defence funding would cost around $3b more per year than predicted, "peaking at about $19b in 2013".[724] Nevertheless, Bush's fiscal year 2007 budget request reiterated his administration's continued commitment to deploying an array of BMD systems, including to Europe. The combined BMD request submitted to Congress in early February 2006 amounted to nearly $11.2b – the largest ever by the Bush administration. Funding was also requested to begin deploying long-range interceptors in Europe to deal with the threat from Iran by 2010.[725] Henry Obering explained that such funding was required because Iran has "not relented in their pursuit of longer-range ballistic missiles. Our current and near-term missile defense fielding activities are a direct response to these dangers".[726]

Despite this, leading Democrats sponsored an amendment to the Defense Authorization Bill that would have cut $4.7b from the missile defence budget in spring 2006. However, this would

[722] Richelson (2007) 537
[723] Confidential Interview (A)
[724] "Long term implications of current defense plans and alternatives: detailed update for fiscal year 2006", *Congressional Budget Office*, (January 2006)
[725] Wade Boese, "Missile defences funding soars to new heights", *Arms Control Today*, (March 2006)
[726] Lieutenant General Henry A. Obering III, USAF Director, Missile Defense Agency Missile Defense Program and Fiscal Year 2007 Budget, (Spring 2006)

fail along party lines 301-124,[727] as would a proposal by Senator Carl Levin (D-MI) several months later to cut off funding for the Ground-Based Midcourse Defense system all together.[728] Another amendment proposed by Congressman John Tierney (D-MA) in the House, which proposed cutting the Pentagon's missile defence budget by more than half, was stymied when the House Republican leadership would not bring the motion up for a vote.[729]

Efforts by the Democrats to impart limits and control on the BMD programme were further undermined on the 5th July 2006, as North Korea test-fired six different ballistic missiles, including the long-range Taepodong-2. Although the Taepodong-2 test was classified as a failure – the missile blew up just 40 seconds after launch, falling into the Sea of Japan, leading Senator Joseph Biden (D-DE) to refer to the missile tests as exposing the North Korean dictator as a "paper tiger"[730] – it caused great concern in the White House and in Congress.[731] Republicans lawmakers in particular reacted to the test firings by touting their party's support for missile defence and praising the expansion of the programme's budget and scope.[732] Senator George Allen (R-VI) represented the views of many when he said that the launches were a reminder of "our need for an effective ballistic missile defense system".[733] The recognition that North Korea conducted a nuclear test on 9th October 2006, therefore cementing its position as the eighth declared nuclear power, also gave the push for BMD added impetus and credibility.[734] As a CRS Report warned:

[727] Amanda Carpenter, "Q&A with Congress: Democrats don't regret filibustering missile defense", *Human Events,* (14th July 2006)
[728] Editorial, "The taepodong Democrats: still against missile defense even in the age of Kim Il-Jong", *Wall St Journal,* (21st July 2006)
[729] Ibid
[730] Christina Bellantoni, "Republicans tout expansion of missile defense", *The Washington Times,* (6th July 2006)
[731] Cirincione (2008) 69
[732] Bellantoni (6th July 2006)
[733] Quoted in Bellantoni (6th July 2006)
[734] David Sanger, "North Koreans say they tested nuclear device", *New York Times,* (9th October 2006). According to Sanger, "Senior Bush administration officials said that they had little reason to doubt the announcement, and warned that the test would usher in a new era of confrontation with the isolated and unpredictable country run by President Kim Jong-il".

> North Korea's willingness to carry out a test in the face of significant opposition indicates that it is willing to endure the potential consequences … analysts fear that the medium and long-term implications could include a more potent nuclear threat from Pyongyang.[735]

Although North Korea had agreed to rejoin the six-party talks by the end of the month, the nuclear test had shifted the debate considerably.[736]

Nevertheless, Democrats were committed to rationalising Bush's missile defence plans during 2006, primarily because they remained deeply sceptical of the technology. In fact, even the Pentagon Director of Operational Test and Evaluation, Charles McQueary cautioned in early 2006 that "flight tests still lack operational realism" and that "this will remain the case over the next year".[737] In light of these developments, on 29th August, several leading Democrats sent Secretary of Defense Rumsfeld a letter in which they questioned the administration's approach to BMD. They argued:

> Since the Strategic Defense Initiative was launched in the mid 1980s, the United States has spent nearly $100bn on missile defense programs and studies with little to show for it … As supporters of fielding a limited missile defense capability that works, we would … like to know when you believe that the American people can be sure that this system will truly defend our country against a threat such as North Korea.[738]

In fact, the GMD system did not achieve a successful test intercept until 1st September 2006; nearly four years after Bush had ordered the system to be deployed, and two years after the first interceptor had been placed in its silo in Alaska. While critics were quick to point out that the flight test fell short of representing a realistic scenario,[739] Henry Obering declared that the test was a "huge success" and that the outcome gave him confidence that the system had a "good chance of destroying a missile in a real attack".[740] A few weeks later Bush announced that he believed the nascent missile defence system would have had a "reasonable chance" of shooting down a long-range missile launched at the US by North Korea should it have threatened the US homeland,

[735] Emma Chanlett-Avery & Sharon Squassoni, "North Korea's nuclear test: motivations, implications and US options", *Congressional Research Service*, (24th October 2006)
[736] Quoted in Richelson (2007) 557-8
[737] Director Operational Test & Evaluation, FY2005 Report, Washington DC, (January 2006)
[738] Letter to Secretary of Defense Donald Rumsfeld (29th August 2006)
[739] Wade Boese, "Anti-missile system scores a hit", *Arms Control Today*, (October 2006)
[740] Interview with Henry Obering (9th August 2010)

although cautioning that the current assets were modest, and that it would be hard to give a "probability of success".[741] Both Henry Obering and Eric Edelman would later say that they believed that the system would have had a good chance to intercepting and destroying the North Korean missile should it have threatened the United States. Obering also pointed out that having a BMD system deployed, stabilised the crisis and allowed the president time to think and respond correctly.[742]

Despite the continuing concerns about testing and technology, Pyongyang's actions significantly strengthened support for Bush's missile defence plans, and virtually sunk the resurgent Democratic campaign before it had started.[743] As a result, Congress appropriated $9.4b for BMD in 2006, a 20% increase over funding in the previous fiscal year, but was cautious about funding for the plan to deploy Ground-Based Interceptors to Europe.[744] Senator John Kyle (R-AZ) described the Democratic policy as "test forever, deploy never", and warned that the 2006 midterm elections would be crucial to the system's future.[745]

After being at the forefront of the political debate for nearly a decade, thanks partly to the wars in Afghanistan and Iraq, BMD policy was a relatively peripheral political issue during 2005 and 2006. This also reflected the growing bipartisan consensus in Congress about deploying a limited and technologically proven BMD system. But above all, it was because George W. Bush's election victory, and the retention of Republican majorities in Congress, meant that the programme remained a central component of the administration's policy agenda. Although the Missile Defense Agency would continue to experience problems in its technology development programme, support in Congress, and a growing concern about North Korea and Iran, continued to drive the programme forward.

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[741] David Sanger, "Bush says US may have been able to intercept North Korean missile", *New York Times,* (8th July 2006)
[742] Interview with Eric Edelman (20th July 2010); Interview with Henry Obering (9th August 2010)
[743] Dana Priest & Anthony Faiola, "North Korea tests long-range missile", *The Washington Post,* (5th July 2006); Snyder (2007) 33
[744] Caitlin Harrington, "Signed defense bills rebuff Pentagon plans", *Arms Control Today,* (November 2006)
[745] Quoted in Fred Barnes, "Going on the offensive for missile defense: defending ourselves has never made more sense", *The Weekly Standard,* (7th August 2006)

2007 and 2008: The battle over missile defence in Europe

In the November 2006 general elections, Democrats won majorities in both the House (for the first time in 12 years) and the Senate, and looked set to begin a new domestic battle with the Bush administration over missile defence.[746] One important result of the Democratic victory was that it put long-time missile defence sceptic Senator Carl Levin (D-MI) back in the influential position of Chairman of the Armed Services Committee. The new Chairman had already made it clear that he thought it was a "mistake to purchase all of the [BMD] missiles before we know that they're going to work",[747] and had told reporters at his confirmation hearing that the Pentagon had "not done the operational testing yet that convinces me that [the system] will work".[748] Consequently, much as they had done in both 2001 and 2004, the Democrats seemed determined to make proper oversight and more rigorous testing the basis of their plan of attack on the president's BMD programme. Baker Spring, writing for The Heritage Foundation, warned missile defence advocates in Congress not to be complacent, because the debate over BMD, particularly in light of recent Congressional elections, remained "far from won".[749]

Following the 2006 mid-term elections, Bush announced that former Director of Central Intelligence Robert Gates would replace Donald Rumsfeld as Secretary of Defense, in order to bring "a fresh perspective to the Pentagon".[750] However, any sign that the change in personnel would mean a scaling back for BMD was quashed during Gates' acceptance speech in which he praised Rumsfeld for taking ballistic missile defence "from theory to reality", and made it clear that he also supported operational testing of weapons *after* deployment, stating that "if something has some capability, it's better than having no capability".[751] As a result, $10.8b would be requested for BMD in fiscal year 2008.[752] Part of this funding would go towards a new plan to protect against

[746] "Democrats win US midterm elections: Rumsfeld resigns", *Asian Political News* (13th November 2006)
[747] Wade Boese, "Missile defense remains budget priority", *Arms Control Today,* (March 2007)
[748] Wade Boese, "Missile defense under scrutiny", *Arms Control Today,* (January 2007)
[749] Spring (6th February 2007)
[750] *Asian Political News* (8th November 2006)
[751] Boese (January 2007)
[752] Boese (March 2007)

the growing threat from the Middle East, particularly the concern that Iran was moving towards constructing a nuclear weapon capable of hitting the United States, which the president, and especially those close to Bush, had become increasingly concerned about in early 2007.[753] The US was also becoming impatient with the diplomatic approach to halt Iran's missile and nuclear programmes - which the State Department and Lt General Henry Obering warned could materialise "inside eight years" - that was being led by the EU-3 and the IAEA.[754] As a result, in early 2007 Bush announced that the US would be formalising negotiations with Poland over housing 10 long-range interceptor missiles at the Redzikowo Air Force Base, and with the Czech Republic over the deployment of a large X-band radar at the Brdy military zone.[755]

Almost immediately after the announcement that US BMD assets were to be deployed in Europe, Russian officials began floating the idea of leaving the 1987 Intermediate-range Nuclear Forces Treaty (INF), and spoke of targeting Russian ballistic missiles on Poland and the Czech Republic should the proposal go ahead.[756] The head of Russian Strategic Forces Nikolai Solovstov, said that Russia might also consider deploying nuclear tipped ballistic missiles in Europe, and arming them with Manoeuvrable Re-Entry Vehicles.[757] In addition to this, Russia began testing the Topol-M ICBM - capable of piercing any current proposed US missile shield - and announced that a Submarine version, potentially armed with manoeuvrable warheads was also being developed.[758] Vladimir Putin publicly dismissed the US rationale for the European system, citing the threat as non-existent, and arguing therefore that the deployment must be aimed at Russia. In response to what he described as this "confrontational behaviour", Putin declared that:

[753] Interview with Henry Obering (9th August 2010)
[754] "US estimates Iran will be able to strike US by 2015", *Janes Defence Weekly* (16th May 2007). The EU-3 consisted of France, Germany and the United Kingdom.
[755] Slocombe (2008) 19
[756] Coyle & Samson (2008) 15
[757] Cimbala (2007) 451
[758] Cimbala (2008) 37

> If a part of the strategic nuclear potential of the United States appears in Europe and, in the opinion of our military specialists will threaten us, then we will have to take appropriate steps in response. What kind of steps? We will have to have new targets in Europe.[759]

Russian concerns about the plan were met with only limited reaction by the Bush administration – essentially Bush and those around him were far more concerned about the growing threat from rogue states than that from Russia. Moreover, US officials recognised the Russian statements as being primarily politically driven. As Henry Obering later remarked:

> The Russians knew what was being built didn't represent a technical threat. It was purely geopolitics. You couldn't catch a Russian ICBM from Poland, nor could the radar in the Czech Republic pick up launches in Russia because its minimum elevation meant it could not see into Russian airspace.[760]

As such, the Bush administration refused to let the repeated threats from Moscow interfere with a plan that they continued to maintain "posed no threat to Russia".[761]

Throughout the second half of 2007, Bush rejected a number of proposals made by Russia to replace the Third Site plan with some type of joint missile defence cooperation.[762] Bush also rejected a suggestion by Vladimir Putin that interceptor missiles might be placed somewhere in Southern Russia, Turkey, Iraq or even at sea.[763] Although Robert Gates said that the US *might* delay activating the European sites until the Iranian (or other) threat had materialised, and that the US *might* make the installations more "transparent to Russia" by allowing for an exchange of observers, Putin responded by promising to strengthen "Russia's military capability" and to "increase spying abroad".[764] In October 2007, at the close of a EU/Russia summit in Portugal,

[759] Vladimir Putin quoted in Cimbala (2008) 52-3
[760] Interview with Henry Obering (9th August 2010)
[761] Ibid
[762] The proposals included the possibility of establishing a cooperative BMD radar-monitoring site at Qabala, Azerbaijan, next to the Iranian border, and for search radar in Southern Russia, near Armavir, just 450km from Iran.
[763] Coyle & Samson (2008) 14; Hildreth & Ek (2008) 13
[764] Cimbala (2008) 36; Cimbala (2007) 458

Putin drew the analogy between the current situation regarding the emplacement of American BMD assets in Central and Eastern Europe and the 1962 Cuban Missile Crisis.[765]

As Bush's 2007 BMD budget request passed through Congress, the Democratic leadership in both Houses sought to impose limits on what the Missile Defense Agency could do, and to impose more stringent oversight and more realistic testing. In terms of the Third Site plan, the Senate Armed Services Committee, headed by Carl Levin, recommended limiting funding for the European BMD project until; (1) agreements with the Poles and Czechs had been completed; (2) Congress had received an independent assessment of options on European BMD, and; (3) the Secretary of Defense had certified that the proposed interceptors had been demonstrated to work.[766] Many Democrats in both Houses viewed the move to deploy assets in Europe as premature, especially because testing of the new two-stage interceptor designed for the European deployment – based on the current three-stage GBI deployed in Alaska and California – would not begin until at least 2010. As a result, they pushed to cut funding for construction of the sites to be built in Poland and the Czech Republic.[767] The House Armed Services Strategic Forces Chairwoman Ellen Tauscher (D-CA), told reporters on 8th November 2007 that Democrats in the House were thinking of pushing the Bush administration to "NATO-ize" the US BMD efforts in Europe, with the longer-range interceptors and radar becoming the long-range aspect of the current NATO BMD programme.[768] Tauscher, a BMD advocate, had criticised the administration's approach as "condescending and rash", suggesting instead that the administration should "take a strategic pause, get the rhetoric right and NATO-ize it".[769]

[765] David Charter, "US plans echo Cuban missile crisis says Putin", *The Times,* (27th October 2007); Coyle & Samson (2008) 8
[766] Hildreth & Ek (2008) 15-6
[767] "Missile Defence Update", British American Security Information Council (BASIC), (28th September 2007)
[768] Michael Bruno, "Congress will push to NATO-ize European BMD site, Tauscher says", *Aviation Week & Space Technology*, (9th November 2007)
[769] Ibid

The debate over deploying further BMD assets in Europe was further complicated in late 2007 by the release of a report by the US intelligence community into the Iranian nuclear programme:

> This NIE does not assume that Iran intends to acquire nuclear weapons … we judge with *high confidence* that in fall 2003, Tehran halted its nuclear weapons program … we judge with *high confidence* that the halt, and Tehran's announcement of its decision to suspend its declared uranium enrichment program and sign an additional protocol to its NNP [Nuclear Non-Proliferation] treaty safeguards agreement, was directed primarily in response to increasing international scrutiny and pressure … we assess with *moderate confidence* Tehran had not restarted its nuclear weapons program as of mid-2007 … [and our research] suggests it [Iran] is less determined to develop nuclear weapons than we have been judging since 2005.[770]

This latest evidence made Democrats even more determined to rationalise the proposed deployments to Europe. Nevertheless, Lt General Obering later commented: "We couldn't wait until the Iranians launched a long-range missile and then start worrying about building out the site … if we had done that, we would have been way behind the curve".[771]

Internationally, in response to these developments in late 2007, but particularly because of the haste with which the Bush administration appeared determined to push ahead, Russia declared itself no longer bound by the 1990 Conventional Armed Forces in Europe Treaty,[772] and a few days later, announced that any launching of American interceptor missiles from the proposed site in Europe might cause a retaliatory Russian missile launch.[773] Domestically, the result was that an unconvinced Congress voted in 2007 to cut Bush's fiscal year 2008 appropriations for the European BMD plan by $85m, and eliminated funds to begin construction in Poland and the Czech Republic.[774]

[770] National Intelligence Estimate (November 2007)
[771] Eric Lipton, "Some Democrats urge delay in building a US missile system in Eastern Europe", *New York Times,* (20th August 2008)
[772] Coyle & Samson (2008)
[773] Hildreth & Ek (2008) 14
[774] Coyle & Samson (2008) 19-20

In early 2008, the Democrats started where they had left off the previous year, and in the spring, the House Armed Services Committee voted to withhold authorisation for most of the requested funds for initial construction in Europe, and proposed language that would withhold funding to build the system until the Secretary of Defense certified that it had been properly tested.[775] Democratic pressure was further boosted by a report from the General Accounting Office released in April, which although congratulating the Missile Defense Agency for "fielding additional and new assets, enhancing the capability of some existing assets, and achieving most test objectives", was also quick to point out that the "MDA did not meet the stated goals it originally stated for the block", in fact it "fielded fewer assets, increased costs by about $1billion, and conducted fewer tests" than it had originally planned.[776] The report highlighted two other significant issues; (1) firstly that the GAO was unable to assess whether the Missile Defense Agency had met its overall system performance goals, or to assess the overall performance of the integrated ballistic missile defence system currently fielded, because there had not been enough flight tests; (2) and secondly that:

> Tests of the GMD element have been of a developmental nature, and have not included target suite dynamic features and intercept geometries representative of the operational environment in which GMD will perform its mission.[777]

A month later, on the 15th May 2008, the Pentagon cancelled its latest GBI missile defence test - its first since the successful test of September 2007 - due to faulty telemetry on the kill vehicle.[778] The abandoned test, and concerns about the technological viability of the GBI programme, continued to alarm Democrats in Congress, and in early August Representative Ellen Tauscher (D-CA) warned the administration: "Go ahead move on with the research and development … but as far as putting holes in the ground in Poland we [the Democrats] are saying no".[779]

Despite the threatening Russian rhetoric, Democratic pressure, technological problems and new intelligence, the Bush administration pushed ahead with the European BMD plan, and on 3rd

[775] Lipton (20th August 2008)
[776] "Defense acquisitions: assessment of progress made on Block 2006 missile defense capabilities and oversight", *US General Accounting Office*, (1st April 2008)
[777] Ibid
[778] Wade Boese, "Anti-missile test shelved by technical glitch", *Arms Control Today,* (June 2008)
[779] Quoted in Lipton (20th August 2008)

April 2008 signed an accord with the Czech Republic to deploy the proposed BMD radar site at the Brdy Military Base. Acquiring a Polish agreement would be slightly more complicated, and at one point during early June, it was even rumoured that the Bush administration was seeking out Lithuania as a possible host of the 10 interceptors Washington intended to deploy.[780] However, on 30th August, Poland signed an official agreement with the US over hosting the proposed 10 interceptor missiles, and Prime Minister Lech Kaczynski expressed optimism that the Polish Parliament would approve.[781] In response, a Russian newspaper reported that Russian bombers capable of carrying nuclear payloads could be deployed to Cuba.[782]

Although Iran had tested a range of ballistic missiles in July – including the Shabab-3, Fateh and Zelzel systems[783], the actual signing of both deals had more to do with developments in Russia, than it did with developments in the Middle East. In fact, the Democrats had looked set to make significant inroads into the budget request and to establish more oversight and stringent testing until the outbreak of the Russia-Georgia war in August 2008.[784] According to Wade Boese, the war "made it virtually certain that Poland and the Czech Republic would ratify the agreements and that progress could begin on the European deployment plan".[785] The war also reignited BMD support within the Republican Party, with missile defence advocate Representative Trent Franks (R-AZ) commenting that:

> It's going to be easier to make our [BMD] case on Capitol Hill now … as this has reminded Poland and some of the other nations formerly dominated by the Soviet Union that the coercive Russia mind-set of militarily threatening your neighbours has not completely disappeared.[786]

However, as Bush left office both agreements had yet to be ratified by the host nation's legislatures, leaving the prospect that the system could be changed or abandoned by the next president. In the

[780] Judy Dempsey, "As Poles balk, US eyes shield in Lithuania as site for missile shield", *New York Times,* (19th June 2008)
[781] Thom Shanker & Nicholas Kulish, "US and Poland set missile deal", *New York Times.* (15th August 2008)
[782] Peter Finn, "Russian bombers could be deployed to Cuba", *The Washington Post,* (22nd July 2008)
[783] "Iran launches dual purpose missiles", *Janes Intelligence Review* (18th July 2008)
[784] For more on the Russia-Georgia war, see Ronald Asmus, *"A little war that shook the world: Georgia, Russia, and the future of the West",* (Basingstoke, Palgrave Macmillan: 2009)
[785] Wade Boese, "US signs European anti-missile deals", *Arms Control Today,* (September 2008)
[786] Quoted in Lipton (20th August 2008)

final draft of the defence budget Bill, funding for the European BMD system was slashed by almost one third to $467m for fiscal year 2009, and it was agreed that funds would not be released until both the Polish and Czech legislatures had ratified the deal.[787] The Bill also mandated that the Secretary of Defense review US BMD policy and submit a comprehensive report to Congress by 31st Jan 2010, and redirected substantial amounts of money away from the more exotic and futuristic programmes such as the space-based interceptor and the Airborne Laser.[788] Nevertheless, in an attempt to continue the push for the European BMD site, Bush requested just over $1b in fiscal year 2009 for the proposed deployments in Poland and the Czech Republic.[789]

The return to power of Democrats in Congress certainly curtailed what Bush was able to do with missile defence policy during the last two years of his presidency, but this did not stop further BMD deployments being made, or stop agreements being reached and signed with the Czech Republic and Poland. What the Democrats were able to do was practice more oversight of the programme by linking further deployments and funding to testing and technological development. Crucially however, the Democrats were limited in what they could achieve by the impact of the Russia-Georgia war, and by the high priority that continued to be placed on the programme by Bush. The result was that the US BMD programme became further normalised and entrenched, which meant the next US president would inherit a rudimentary global missile defence system.

(3) Assessing the drivers of policy, 2005-2009

The US ballistic missile debate between 2005 and 2009 was shaped by a growing concern about North Korean and Iranian WMD programmes, and by gradual developments in BMD technology. Neither pressure however can fully explain the alacrity or specifics of the programme pursued by the Bush administration during this period, or indeed the apparent rush to deploy additional

[787] Wade Boese, "Hill adjusts Bush's proposed military spending", *Arms Control Today*, (November 2008)
[788] Ibid
[789] Coyle & Samson (2008) 5

interceptors in Europe. In this sense, it was the actions and thinking of the Bush administration – namely the desire to deploy assets as quickly as possible, and with little regard to Russia – combined with a Republican controlled Congress in 2005 and 2006, and then a Democratically controlled Congress in 2007 and 2008, that explains the particular rhythms of the debate during this period.

International and technological factors

While it was generally accepted that both Iranian and North Korean WMD programmes represented a growing concern during Bush's second term, there was little consensus about the scale, extent and shape of these threats, and analysts and commentators remained split by how quickly each state could acquire a capacity to hit the US with a nuclear weapon. Specifically, developments in Iran – and information from the US intelligence community - cannot fully explain the haste with which the Bush administration attempted to push ahead further missile defence deployments in Europe. Neither does this explain the apparent preference for strategic deployments apparently at the expense of defences against short-range and regional threats – despite the latter remaining the key threat facing the US. Moreover, and while the apparent willingness on the part of the Bush administration to ignore repeated threats from Russia over US BMD plans had much to do with the changing US-Russian relationship after the Cold War, the fact that Bush and those around him paid so little attention to these threats had much to do with national security thinking within the administration.

Missile defence technologies undoubtedly matured during this period, but politics remained largely out-of-sync with technology. In particular, continuing problems with the GBI cast doubt on the technological efficacy of deploying more assets in Alaska and California, and especially over agreeing to deploy assets in Europe based on these interceptors that had not even begun testing. Missile Defense Director Henry Obering would later suggest that long-range BMD systems

appeared to be privileged during this period because "other short and medium range system were taking longer to develop, and were intended to come online after 2008."[790] But this does not explain the haste and alacrity with which the administration sought to push ahead. In the words of Richard Burns,

> At the end of George W Bush's presidency, there appeared to be little public discussion about the operational reliability of the various BMD projects or the costs involved in their research and deployment. Despite optimistic and often exaggerated official claims to the contrary, there was considerable room for scepticism about the reliability of the administration's missile defense system. Indeed, few BMD projects could claim to have been tested in a realistic setting, that is, tested in a real-world environment, without scripted tests, fending off realistic countermeasures, and manned by regular military units rather than civilian specialists.[791]

Domestic factors

As had largely been the case between 2001 and 2005, President Bush remained the key driver of BMD policy during between 2005 and 2009. Primarily, it was the worldview and thinking of Bush – and of those around him – that underpinned the strong desire to push rapidly ahead with development and deployment of a variety of BMD systems. Essentially it was the fact that the administration was fully prepared to pay a diplomatic price in angering Russia, and to deploy assets before fully tested, in order to address the threats from Iran and North Korea, that drove policy forward. In this sense, Bush was deliberately pushing policy beyond what either the threat appeared to justify, or indeed, what technology could achieve. For Bush, getting something deployed was better than nothing primarily so that the US could stay ahead of the perceived threat, but also so that the system would survive his presidency. It was because of this that additional interceptors continued to be deployed in Alaska and California throughout this period – despite problems with the GBI programme – and why Bush was so keen to reach agreement on deploying further assets to Europe during 2007 and 2008.

[790] Interview with Henry Obering (9th August 2010)
[791] Burns (2010) 130

However, the particular pressure brought to bear on policy by Congress is also an important factor in understanding policy during this period. In particular, Republican control of Congress during 2005 and 2006 ensured that Bush was essentially able to push ahead unhindered, allowing the president to rapidly expand and entrench his BMD plans. However, the return to power of the Democrats for the last two years of Bush's presidency ensured a far higher level of Congressional scrutiny and oversight on policy during 2007 and 2008. The direct result of this was Bush's inability to finalise deals with Poland and Czech Republic over the Third Site plan, and the curtailment of several of the more futuristic plans under development at the Missile Defense Agency. Consequently, Congressional pressure on policy was split during this period, which in turn would have important implications for both policy and the BMD debate.

As a result, the ballistic missile debate, and its particular evolution during this period, remained shaped by *domestic political actors* as much as by technology or by the international system, and by the interaction of these factors. Bush and the Republicans remained determined to push ahead with BMD, while Democrats favoured restraint. But by 2009, both had essentially come to accept the reality of missile defence as a component of US security policy. To an extent, the debate was also shaped by these actors acting for *domestic political reasons*; Bush was certainly determined to ensure the longevity of the programme by deploying lots of assets before he left office, while Republicans in 2005, and Democrats in 2007, would use BMD for party political reasons. The result was a policy that would appear slightly out-of-sync with systemic trends and technological capabilities.

Conclusion

Under the stewardship of George W. Bush, the US BMD programme evolved with great rapidity between 2005 and 2009. During these years more assets were deployed to protect the US homeland

in Alaska and California, agreements were reached about expanding the system to Europe, and over $40b was spent on the US BMD effort. The direct result was that the missile defence debate shifted further towards acceptance, whereby disagreements became largely confined to the periphery, and over how and what to deploy, rather than about whether to deploy or not. As such, ballistic missile defence would become politically and strategically entrenched in US national security thinking and policy during Bush's second term. In fact, as a sign of this new permanence, in November 2008, the Pentagon began building a new multi-million dollar missile defence "Headquarters Command Centre" at Fort Belvoir in Virginia.[792]

While the growing concern about Iranian and North Korean WMD programmes can partly explain why Bush was so keen to push ahead, the fact that the president remained determined to continue deploying assets despite the anxiety it was causing in Moscow, and despite continued technological problems, suggests that the prime driver of policy the Bush administration itself. Bush prioritised the rogue state missile threat over better and more stable relations with Russia, and saw deployment of missile defences as paramount to US security. At the same time, Bush pursued this path with questionable technological justification, for while there was an argument for the spiral development model being used, this did not mean that technology was driving policy forward. In fact, the only real pressure on policy came after 2006, as Democratic lawmakers sought to increase scrutiny and oversight, and to rationalise the proposed deployments to Europe. Nevertheless, without the wars in Iraq and Afghanistan, it is likely that even more money would have been spent on BMD, and even more progress may have been made during this period.

As George W. Bush left office, the US had a rudimentary ballistic missile defence system deployed and theoretically capable of defending the US homeland against a limited and unsophisticated missile attack. In addition to this, the US military was taking control of an expanding inventory of battlefield missile defence systems, and great strides were being made at implementing various other theatre missile defence systems and plans, notably the Aegis and SM-3

[792] Mark Thompson, "Why Obama will continue Star Wars", *TIME*, (16th November 2008)

programmes. The result was a burgeoning global missile defence capacity, a further shift in the debate towards acceptance of BMD, and a considerable structural legacy for any future administration.

The reluctant convert – Barack Obama, 2009-2010

Barack Obama took office in January 2009, much like the previous Democratic president, Bill Clinton, determined to reduce the defence budget, refresh US foreign policy, and concentrate his time and energy on his expansive domestic agenda. Obama looked set to decrease funding for BMD, recalibrate the programme and relegate it in importance, in order to pursue a more diplomatic approach to world affairs. With Democrats in control of Congress, questions remaining about the efficacy of various BMD technologies, and with Russian antagonism about US BMD plans mounting, it appeared that Obama might be able to rationalise the programme that he had inherited from George W. Bush, in order to fulfil his wider policy agenda.

However, and despite his determination to downgrade the BMD programme, during 2009 and 2010 Barack Obama oversaw what amounted to considerable continuity in US missile defence plans and capabilities. The replacement of the Third Site with the Phased Adaptive Approach (PAA) for missile defence in Europe looked set to be a far more comprehensive system than that envisaged by the Bush administration. The February 2010 Ballistic Missile Defence Review (BMDR) outlined a plan whereby US BMD assets could be deployed all over the world in ever increasing numbers, and in coordination with US allies. BMD budget requests were retained at levels just below those requested under George W Bush, and more than double those under Ronald Reagan, George H. W. Bush and Bill Clinton. Lastly, the Obama administration refused to accept any limits on US BMD plans as part of the negotiations over New START – a key administration priority – and the centrepiece of the US-Russian "re-set". As such, President Obama essentially presided over a continuation, and in some cases expansion, of the BMD programme that he had inherited, despite it appearing to undermine wider policy agendas.

The evolution of policy under Obama raises a number of interesting questions. First, why did Obama continue to spend vast sums of money on BMD despite campaign pledges to cut funding, rein the programme in, and focus on other means of addressing the threat from proliferation? Second, why did Obama refuse to use BMD as a bargaining chip with Russia, even though US BMD plans were seen as one of the main impediments to the "re-set" and reaching agreement on New START? Finally, why did Obama appear to outline a bigger BMD plan for Europe than the Bush administration, and commit his own administration to deploying even more components of this system throughout the globe? At least part of the answer to these questions was the importance of the domestic political pressures brought to bear on policy during this period.

(1) Competing pressures on BMD policy, 2009-2010

Barack Obama took office at a time when concern was mounting about Iran and North Korea; Russia was becoming more antagonised by US BMD plans; technology was slowly moving forward, and most lawmakers in Congress had largely accepted the necessity of missile defence as a component of US security. Obama was also the only US president looked at in this thesis to inherit a deployed national missile defence system theoretically able to defend against a limited missile attack on the US homeland. As a result, one of the main pressures on policy as Obama took office was the structural inheritance from the Bush administration. It was in this context that Obama set about trying to normalise and rationalise the US missile defence programme as part of his wider agenda of change.

International pressures on policymaking

International pressure would again be bifurcated during this period between the demands of retaining good and stable relations with strategic competitors such as Russia, and the need to

address the growing WMD threats from Iran and North Korea. In this sense, apart from the recognition that Iran and North Korea were augmenting their WMD capabilities, and that Russia was becoming more concerned about US BMD plans, the international pressures on policymaking remained essentially the same as they had done for the last few years of the Bush administration.

Russian president Dmitri Medvedev wasted little time after the 2008 presidential election in applying pressure on Obama over the missile defence issue, and Moscow's concerns and possible reactions to US BMD plans would be a key influence on policy during this period. In a speech on 5th November 2008 for example, Medvedev announced that:

> If US interceptors were deployed in Poland, Russia would target them with new deployments of Iskander ballistic missiles in the Kaliningrad enclave, and plans to decommission three regiments of nuclear-armed long-range missiles in Western Russia would be scrapped.[793]

Later in this period, Russian leaders would strive to link the New START nuclear arms reduction treaty with limits on missile defence, and failing that, make clear their intention to leave the Treaty should US BMD plans go ahead as scheduled.[794] The result was that Russia – and to a lesser extent China – would exert significant pressure on Obama's BMD plans and on the US missile defence debate during 2009 and 2010.

Concern also continued to grow about Iran and North Korea. Specifically, the diplomatic approaches to both nations, but particularly Iran, were not achieving the success that Obama had hoped. This period saw a gradual realisation that Teheran had resumed its nuclear weapons programme and was getting ever closer to being able to acquire such a capability, and that the

[793] Wade Boese, "Anti-missile systems uncertainty grows", *Arms Control Today*, (December 2008). In response, Secretary of Defense Robert Gates argued that this was "hardly the welcome that the new administration deserves" and that the remarks were "provocative, unnecessary and misguided".

[794] See "New START Treaty Fact Sheet: Unilateral Statements", *US State Department*, (13th May 2010). The Russian statement declared: "The Treaty between the Russian Federation and the United States of America on the Reduction and Limitation of Strategic Offensive Arms signed in Prague on April 8th, 2010, can operate and be viable only if the United States of America refrains from developing its missile defense capabilities quantitatively or qualitatively. Consequently, the exceptional circumstances referred to in Article 14 of the Treaty include increasing the capabilities of the United States of America's missile defense system in such a way that threatens the potential of the strategic nuclear forces of the Russian Federation.

preferred diplomatic approach to Iran simply wasn't working.[795] At the same time, a renewed diplomatic approach to North Korea also showed little evidence of bearing fruit, as Pyongyang test fired a three-stage rocket over the Sea of Japan, ejected IAEA weapons inspectors, and in May 2009 conducted its second underground nuclear test. However, while concern was growing about Iran and North Korea, new assessments from the US Intelligence Community suggested that the growth in North Korean, and particularly Iranian WMD capabilities remained primarily in short and medium-range missiles, and not ICBMs able to hit the US homeland.[796] A direct result of these developments would be increased pressure from US allies in Europe, the Greater Middle East and East Asia to address these concerns.

Technological pressures on policymaking

Despite the large sums of money spent and the advances made under the Bush administration, assessing the actual capability of various BMD technologies remained complicated. On the one hand, the Bush administration had begun deploying systems such as the Ground Based Interceptor in 2004, but on the other, many of these assets had not undergone full testing. At the same time, many specific details about the performance of the GBI, and indeed several other programmes, remained classified. Consequently, as Barack Obama entered office, he was faced with a number of BMD systems in various states of development, and with various levels of proven effectiveness.

Within this milieu, one of the most important technological dynamics influencing BMD during 2009 and 2010 was the decision to abandon the spiral development deployment process, and terminate the approach whereby assets could be deployed before fully tested. This change of policy would allow the administration to more clearly gage the performance of specific BMD programmes

[795] See Wyn Bowen & Jonathan Brewer, "Iran's nuclear challenge: nine years and counting", *International Affairs,* 87:4 (2011), pp923-943
[796] Cole Harvey, "Obama shifts gears on missile defense", *Arms Control Today,* (October 2009)

before deployment, and therefore to prioritise and deploy programmes with better testing records.[797] This would manifest in a move away from the Ground-Based Interceptor programme – which Pentagon Director of Operational Test and Evaluation Charles McQueary admitted that he could not "say with high confidence … was operationally effective"[798], and which would fail two operational tests in January and December 2009 – towards a more flexible, capable and cost-effective architecture offered by the SM-3 and Aegis systems. By April 2011, the SM-3/ Aegis system had achieved 16 out of 18 operationally configured tests, and cost nearly six times less than the much larger GBI.[799] Rigorous scrutiny and oversight of technology would also lead to the cancellation of a number of lesser performing and futuristic technologies that had enjoyed considerable patronage under the Bush administration. This change of strategy would be codified in the February 2010 Ballistic Missile Defense Review, which outlined the administration's desire to shift the technological development programme towards theatre missile defence systems, and towards systems with the best testing track records.[800] Nevertheless, Obama and Secretary of Defense Robert Gates would insist during this period that the 30 GBIs already deployed were sufficient to protect the US against any new near-term long-range missile threat.[801]

Presidential policy agenda

Unlike his Republican predecessor, President Obama did not see ballistic missile defence as a policy priority for his administration during the 2008 presidential campaign. In fact, John Isaacs suggested that "Obama was neither for nor against BMD", and that his administration's approach to the issue would be "pragmatic", and depend upon balancing other priorities.[802] The Obama administration made it clear that it favoured a diplomatic approach to North Korea and Iran, and

[797] See "The missile defense programme 2009-2010", *Missile Defense Agency* (3rd August 2009)
[798] Quoted in John Liang & Carlo Munoz, "The endgame", *Inside Missile Defense,* 15:5 (11th March 2009)
[799] Ibid; Lt Gen Patrick O'Reilly, Testimony to the House Armed Services Committee, (1st October 2009)
[800] "Ballistic Missile Defense Review Report" (February 2010)
[801] See Jim Wolf & Andrea Shalal-Esa, "US defense plan kills programs, trims missile shield", *Reuters,* (6th April 2009)
[802] Interview with John Isaacs (19th July 2010)

would place a "re-set" of relations with Russia at the top of its agenda. As part of this, Obama entered office keen to recalibrate the BMD programme to reflect the most pressing threats and the most advanced technologies.

The first key presidential pressure on BMD policy was Obama's much-publicised desire for change in the way that the US approached the world, and his determination to prioritise his expansive domestic agenda. Obama had made it clear in 2008 in response to a series of missile tests by Iran that he saw "direct and aggressive diplomacy" not missile defence as the primarily means to deal with "rogue states",[803] and in a later interview with *Arms Control Today*, went on to declare that he believed that "the real 21st century threats [were not] rogue states lashing out with ballistic missiles, but a terrorist smuggling a crude nuclear device across our borders".[804]

The second dynamic was the determination to reset relations with Russia, and to push hard for a new strategic arms reduction agreement. As well as seeking to repair the perceived damage caused during the previous administration, and in order to enlist support for key US foreign policy objectives, Obama was also determined that a new and substantial arms reductions deal with Moscow would be the springboard needed to reinvigorate the nuclear disarmament agenda. Shortly after being elected, Obama declared:

> The United States and Russia should seek real, verifiable reductions in all US and Russian nuclear weapons … I am committed to working with Russia and other nuclear weapon states to make deep cuts in global stockpiles by the end of my first term.[805]

In fact, Obama's so called "Prague speech"[806] on nuclear disarmament would become a centrepiece of the US approach to world affairs during 2009 and 2010.

Finally, Obama's approach to BMD was governed by his desire to prioritise what he perceived to be near-term threats and proven technologies. Essentially, the president believed that the focus of the BMD programme should be shifted from homeland defence towards a greater

[803] Michael Cooper, "US candidates use Iran's missile tests as a chance for a foreign policy debate", *New York Times,* (10th July 2008)
[804] "Arms Control Today presidential Q&A: President-elect Barack Obama", *Arms Control Today,* (December 2008)
[805] Ibid
[806] "Remarks by President Obama, Hradcay Square, Prague, Czech Republic", (5th April 2009)

concentration on battlefield and theatre missile defences, and away from the problematic GBI programme towards the Aegis SM-3 system. Obama had earlier declared: "as president I will make sure any missile defense, including the one proposed for Europe, has been proven to work and has our allies' support before we deploy it."[807] This approach to BMD would be reflected in both the decision to alter the missile defence plan for Europe, and in the administration's Ballistic Missile Defense Review.

In sum, Barack Obama did not appear to see ballistic missile defence as a priority as he entered office, and it some respects it seemed to represent a stumbling block in achieving many of his administration's other policy priorities. Obama did not want BMD to undermine his attempts to negotiate a new arms control deal with Moscow, or his wider goal of nuclear reductions, and therefore seemed destined to cut the US ballistic missile defence budget and deal with the economic recession. Although this was a sign of things to come, Obama would retain the services of Robert Gates as Secretary of Defense, which suggested a certain amount of continuity with the previous administration in the field of BMD.

Congressional pressure on policymaking

The elections for the 111th Congress in 2008 saw the Democrats increase their majorities in both the House and the Senate. As a result, the Democratic Party controlled both the presidency and Congress for the first time since 1993, which suggested that Congressional pressure on Obama's BMD policy would be relatively limited. Although Democrats had come to accept ballistic missile defence as a component of US national security policy, they nevertheless remained keen to ensure that anything that was deployed had been properly tested, and that any US missile defence plans would not get in the way of wider foreign policy goals. As a result, in early 2009, Dean Wilkening

[807] Ibid

suggested that "the era of partisan support for BMD is over", and that debate in Congress would now predominantly concern the limits of the US missile defence programme.[808]

Despite being in the minority in both Houses, Republican lawmakers would seek to bring considerable pressure to bear on policy during 2009 and 2010. Although both parties tacitly accepted a role for BMD, they remained divided over exactly how the US should develop this capability. According to one Congressional official, by 2009:

> Democrats sought to deploy technologically proven systems against the most pressing threats, while Republicans sought to deploy missile defences against a range of threats that they believed to be real and growing.[809]

A direct reflection of this would be the Democratic tendency to prioritise development and deployment of battlefield and theatre missile defences to ensure protection of US troops and US freedom of action overseas, and the Republican desire to explore and deploy more advanced technologies to protect the US homeland from new and emerging strategic threats.[810]

Republican pressure on policy would be driven by a mixture of political and ideological dynamics; partly by their genuine support for BMD, and partly by the desire to apply significant political pressure to the new president, which would see lawmakers taking issue with Obama's first budget request, the decision to change the BMD plan for Europe, and in particular, the New START agreement. Much as had been the case during the 1990s, Republicans appeared determined to paint a Democratic president as being "weak on defence" and as undervaluing the importance of BMD to US security. The result was a fiercely partisan Congress that saw strong divisions and debate on almost every aspect of the president's policy agenda.

Despite the fact that most lawmakers had either embraced or resigned themselves to accepting BMD by 2009, Congress continued to be divided over the issue. Rather than debate the relative merits of missile defence, however, the main lines of argument were now about the extent

[808] Interview with Dean Wilkening (9th July 2010)
[809] Confidential interview (A)
[810] Confidential interview (B)

and shape of such a programme, and which technologies should be prioritised. Even though the debate about BMD had moved very much to the periphery, it remained a vehicle for political battles in Congress and a way of attacking the president.

(2) The evolution of policy, 2009-2010

As Barack Obama took office, there was a feeling that a degree of normality would return to the US missile defence effort, and that more time and energy would be spent on ensuring that various programmes were properly tested before being deployed. It was also felt that deployments would form part of a more balanced US approach to world affairs. Obama himself had made it clear that he saw BMD as only one of a range of tools with which to address the threat of proliferation, and that a "reset" with Russia and a broader "change" in US foreign policy would be central to his agenda. With an economic recession demanding full attention at home, it appeared that Obama would strive to rationalise the programme that he had inherited from George W. Bush, in order to focus his time on other key priorities.

2009: A world free from nuclear weapons and the end of the Third Site in Europe

In late 2008, Wade Boese, of the Washington DC-based Arms Control Association, suggested that the election of Barack Obama as president had "triggered great uncertainty about the future of US anti-missile projects, particularly the disputed plan to deploy long-range interceptors in Europe".[811] Although Obama and his Republican rival John McCain – a supporter of BMD – did not directly debate missile defence during the election, it was assumed that he would move quickly to rationalise and limit the expansive BMD agenda of his predecessor. Although it appeared unlikely that Obama would reverse the missile defence deployments that had been made under Bush, as had

[811] Boese (December 2008)

been done with Safeguard in the 1970s[812], the future of the programme in early 2009 looked uncertain.

The first real hint of Obama's missile defence strategy was given during an interview with Arms Control Today shortly after the 2008 election. In the interview, Obama made it clear that BMD could be a significant part of a plan to reduce the threats from ballistic missiles armed with weapons of mass destruction, but that they "must be proven to work and pursued as part of an integrated approach that uses the full range of non-proliferation policy tools in response to the full range of threats we face."[813] As the Missile Defense Agency would announce several months later, particular emphasis would also placed on the thorough testing of assets before deployment:

> [We have] Restructured our test program to improve confidence in the missile defense capabilities under development and ensure that the capabilities transferred to the war-fighter are operationally effective, suitable and survivable.[814]

By cancelling the spiral development model, the Obama administration made it clear that various missile defence assets would only be deployed when proven technologically; irrespective of developments in threat. Moreover, emphasis would now be placed on the "development of low and medium risk systems" at the expense of systems perceived to be more costly and futuristic entertained under Bush.[815]

In addition to a renewed approach to technological development and deployment strategy, the Obama administration also made more direct changes to the way in which the BMD programme was funded and structured. The greatest example of this came in the administration's first BMD budget request, which as well as representing a £1.2b cut from the previous year's appropriation, clearly outlined the administration's change of focus for what the programme should do. The $7.8b request for BMD by Obama for FY2010 would, in the words of Secretary of Defense Robert Gates, primarily "focus on the rogue state and theatre missile threat" by shifting funding away from the

[812] The safeguard missile defence system was deployed by President Richard Nixon in 1975 to defend US ICBM silos, and was closed just a few months later. For more on this see Yanarella (2002) 120-187
[813] Obama (December 2008)
[814] *Missile Defense Agency* (3rd August 2009)
[815] Ibid

Ground-Based Interceptor programme designed to protect the US homeland, and other futuristic programmes such as the Kinetic Energy Interceptor (KEI) and Multiple Kill Vehicle (MKV), and towards Aegis, THAAD and Patriot, designed primarily for the defence of US forces, allies and friends in unsecure regions overseas.[816]

The budget also made it clear that the cut in funding was primarily because the Obama administration felt that the 30 Ground-Based Interceptors already deployed in Alaska and California were sufficient to protect the US against a limited rouge state missile threat. Executive Director of the MDA David Altwegg proclaimed that he had "high confidence in … the ability [of the system] to take on the known ballistic missile threat posed by the rogue countries Iran and North Korean today."[817] While, Robert Gates remarked: "the US has the defenses it needed for now to protect from a long-range ballistic missile of the type [being tested by] North Korea".[818] Because of this, the Missile Defense Agency pointed out:

> The mission of the MDA continues to be one of developing and fielding an integrated, layered ballistic missile defense system (BMDS) to defend the United States, our deployed forces, allies and friends against all ranges of enemy ballistic missiles in all parts of the world.[819]

As a result, during the first few months of his presidency Obama appeared determined to alter the trajectory of the BMD programme and refocus it towards near–term threats and proven technologies. Nevertheless, these plans were met with a mixed reaction. In March 2009, for example, a bipartisan group of Senators including Jeff Sessions (R-AL), Joe Liberman (I-CC) and Mark Begich (D-AK) sent the president a letter warning him that cutting funding for BMD would leave the US vulnerable to the growing ballistic missile threat.[820]

[816] Jenny Shin, "Overview of the fiscal year 2010 ballistic missile defense budget request", *Center for Defense Information*, (20th May 2009)
[817] "DOD News Briefing with David Altwegg – Executive Director, MDA", (7th May 2009)
[818] Jim Woolf & Andera Shalal-Esa, "US defense plan kills programs, trims missile shield", *Reuters*, (6th April 2009)
[819] *Missile Defense Agency* (3rd August 2009)
[820] Andrea Shalal-Esa, "Gates takes aim at arms programs, Congress fights back", *Reuters*, (6th April 2009)

Obama was keen to put his "change" agenda into action as soon as possible, and the result would be two interlinked policy developments. The first was a renewed diplomatic effort aimed at solving the ongoing impasse over Iran's suspected WMD programmes (which if successful might negate the need to deploy a BMD system in Europe). The second was the desire to reset relations with Russia, enlist Moscow's support in dealing with Iran, and begin thinking about a new bilateral nuclear arms reduction agreement. Underlying these aims appeared to be the president's desire to scale down the US BMD effort and place more emphasis on other foreign policy tools.

In March 2009, Obama announced a new diplomatic opening to Iran, and stressed his administration's commitment to begin a new phase of relations with Teheran. Obama made it clear that US strategy would put emphasis on diplomacy and negotiation, and for the moment this would mean that further punitive sanctions imposed because of Iran's suspected nuclear programme would be dropped.[821] What is more, by referring to the current regime as the "Islamic Republic", the president made it clear that he was willing to deal with the current clerical government in Teheran.[822] Obama declared:

> My administration is now committed to diplomacy that addresses the full range of issues before us, and to pursuing constructive ties among the US, Iran and the international community. This process will not be advanced by threats.[823]

This opening to Iran represented a significant break from what had been pursued by the Bush administration, and immediately called into question the future of the proposed Third Site BMD system in Europe. More broadly, it seemed to suggest that multilateralism and diplomacy would now be elevated to a more central role in US national security policy, partly, it seemed, at the expense of BMD. While the new approach reflected Obama's ideals and values, it was also underpinned by the president's desire to accentuate the political cleavages in Iran before the summer's election, and to complement the wider agenda of resetting relations with Russia.

[821] Helene Cooper & David Sanger, "Obama's message to Iran is opening bid in diplomatic drive", *New York Times*, (20th March 2009)
[822] Ibid
[823] Ibid

The Obama administration hoped that the Iranian WMD programme could be controlled through diplomacy and that certain missile defences may not therefore be needed. Missile Defense Agency Executive Director David Altwegg made this clear:

> As long as the threat from Iran persists, we intend to go forward with a missile defense system that is cost-effective and proven. If the Iranian threat is eliminated then the driving force for missile defense construction in Europe at this time will be removed.[824]

In fact, in early March the *New York Times* revealed that President Obama had sent Russian President Dmitri Medvedev a secret letter in which it was suggested that the US would "back off" deploying a new missile defence system in Eastern Europe if Moscow would help to prevent Iran from developing long-range nuclear weapons.[825] Although the letter did not contain any specific proposals or mutually binding initiatives, it did represent a strategic quid-pro-quo, and reiterated comments made by Robert Gates on 20th February 2009 that "if there were no Iranian missile program, there would be no need for the missile defense sites."[826] However, following the diplomatic opening in the spring, little progress was made towards curtailing the Iranian WMD programme, a problem exacerbated by the messy "re-election" of Mahmoud Amadinejad in June 2009. To complicate matters more, a few months later Amadinejad declared: "Iran will never give up its nuclear program to appease Western critics."[827] Consequently, the pressure for some type of BMD system in Europe mounted.

The final component of Obama's agenda was his desire to place nuclear arms reductions and the goal of nuclear disarmament back at the centre of US foreign policy. To this end, the president unveiled two significant policy initiatives in April 2009. The first was a speech given by the president in Czech capital, Prague, where he stated "America's commitment to seek the peace and security of a world without nuclear weapons".[828] The second component was the decision to begin discussions with Russia over a new strategic nuclear arms reduction treaty to replace START I

[824] "DOD News Briefing with David Altwegg – Executive Director, MDA", (7th May 2009)
[825] Peter Baker, "Obama offered deal to Russia in secret letter", *Arms Control Today,* (3rd March 2009)
[826] Ibid
[827] Joanne Allen, "Ahmadinejad: Iran will never stop nuclear program", *Reuters,* (17th September 2009)
[828] "Remarks by President Obama, Hradcay Square, Prague, Czech Republic", (5th April 2009)

(which was due to expire in December 2009). Obama would meet with Russian president Dmitri Medvedev on 26th April 2009 in London to begin discussions on how the US and Russia might make further cuts to their nuclear arsenals.

During the summer, developments in North Korea and Iran continued to make Obama's planned cuts less politically tenable, as Republicans in Congress bombarded the administration with amendments to restore BMD funding. The main cause of this concern had been the launch of North Korea's Unha-2 rocket (widely believed to be a modified version of its long-range Taepo Dong-2 ballistic missile) in February 2009, and the declaration shortly afterwards that Pyongyang would be withdrawing from the Six-Party Talks, and expelling International Atomic Energy Agency and US weapons inspectors.[829] Pressure on the president was further increased in May 2009 as North Korea proclaimed that it had conducted its second underground nuclear test, with an estimated yield of 2 to 8 kilotons, and two months later test fired seven different ballistic missiles.[830] Nevertheless, in Congress, Democrats successfully rejected the restoration of $120m for the GMD programme to field the 44 interceptor missiles planned by the Bush administration, and the $1.2b to fully fund all other programmes.[831] Representative Trent Franks (R-AZ) remarked that:

> Democrats have once again rejected valuable amendments today that would have restored the critical funding needed for a robust ballistic missile defense … they have shown an unbelievably dangerous disregard for reality … such short lived so called political victories have no place in the public forum when they hold such potentially grave consequences for America's national security.[832]

Although domestic pressure would later lead the president to announce that the Pentagon would complete the construction of the 14 GBI silos at Ft Greely that the original budget request had cut, these would not be filled with interceptor missiles.[833] Consequently, and despite strong Republican pressure, Democratic control of Congress allowed Obama's BMD budget request to pass through largely unscathed.

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[829] Peter Crail, "N. Korea launches rocket, renounces talks", *Arms Control Today*, (May 2009)
[830] David Sanger, "Tested early by North Korea, Obama has few options", *New York Times*, (26th May 2009)
[831] *Targeted News Service* (10th December 2009)
[832] Quoted in *Targeted News Service* (10th December 2009)
[833] John Liang, "GOP lawmakers laud MDA for about-face on Ft Greely silo completion", *Inside Missile Defense*, (18th November 2009)

On 17th September 2009, rather short-sightedly on the 70th anniversary of the Soviet invasion of Poland, the Obama administration announced that it would be cancelling the Third Site plan for BMD in Europe and replacing it with a Phased Adaptive Approach (PAA). In a low-key announcement at the White House Barack Obama declared:

> The new approach will provide capabilities sooner, build on proven systems, and offer greater defenses against the threat of missile attack than the 2007 European missile defense programme … It is more comprehensive than the previous programme; it deploys capabilities that are proven and cost-effective; and it sustains and builds upon our commitment to protect the US homeland against long-range ballistic missile threats.[834]

Perhaps the key dynamic underpinning the new plan was that while the WMD threat from Iran was seen to be increasing, the actual specifics of the threat seemed to be changing. The shape of the new BMD plan for Europe was also therefore fundamentally driven by new evidence from the intelligence community. Robert Gates explained:

> The intelligence community now assess that the threat from Iran's short and medium-range ballistic missiles, such as the Shahab-3, is developing more rapidly than previously projected [while] the threat of potential Iranian ICBM capabilities has been slower to develop than was previously estimated in 2006.[835]

The change in plan was also driven by technological assessments from the ongoing Ballistic Missile Defense Review, which made it clear that better performing, near-term systems should be prioritised over those with a less promising record, and those that were considered more futuristic.[836] The PAA was also a reflection of the fact that the preferred diplomatic approach to Iran simply was not working. In the words of Mark Fitzpatrick, analyst at the International Institute for Strategic Studies, the PAA "replaces a system that had experienced serious operational and developmental problems with radars and interceptors that are much more capable and are likely to be better in the future."[837]

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[834] Barack Obama, *"Remarks by the president on strengthening missile defense in Europe",* (17th September 2009)
[835] Harvey (October 2009)
[836] "Ballistic Missile Defense Review Report" (February 2010)
[837] Mark Fitzpatrick, "A prudent decision on missile defence", *Survival,* 51:6 (2009), pp5-12: 5

The PAA was designed to proceed in four stages beginning in 2011, and culminating in 2020 with a comprehensive missile defence system able to protect against a wide range of threats:

> (1) Field by 2011 the Aegis sea-based BMD system armed with SM-3 (Ia) interceptor missiles to protect US troops and parts of South-eastern Europe against short-range missile attack.
>
> (2) Field by 2015 new SM-3 (Ib) interceptor missiles both at sea and on land (at bases in Northern and Southern Europe), allowing for protection of a wider area against short and medium range ballistic missiles.
>
> (3) By 2018 deploy even more powerful SM-3 (IIa) interceptor missiles, in addition to previous deployments, that could be used against short, medium or intermediate-range attacks against the entire European landmass.
>
> (4) By 2020 deploy the SM-3 (IIb) interceptor missile against all types of threats giving the system the capacity to protect all of Europe and the United States against ICBM threats.[838]

As such, the plan envisaged deploying BMD assets, notably the Aegis and SM-3 systems, in Europe during 2011 to counteract the most basic and short range-threats to the South Eastern Mediterranean, seven years before the Third Site plan might have been operational. By 2020, the plan could potentially outstrip anything the Bush administration had proposed and could incorporate hundreds of interceptor missiles on land and at sea, that could protect Europe *and* the United States against the whole gamut of Iranian missile threats. Missile Defense Agency Director Lt General Patrick O'Reilly (2008-) was quick to point out that the MDA was "not scrapping or diminishing missile defense – rather we are strengthening it and delivering more capability."[839] However, David Berteau of the Center for Strategic and International Studies warned that this was

[838] "Fact Sheet on US Missile Defense Policy: A Phased Adaptive Approach for missile defense in Europe", (17th September 2009)
[839] Lt Gen Patrick O'Reilly, Testimony to the House Armed Services Committee, (1st October 2009)

"an ambitious timeline", and raised his concern about the lack of a serious "developmental programme to support this" effort.[840]

The announcement was met with a strong reaction from Republicans and missile defence advocates. Howard McKeon (R-CA) stressed his concern that "the administration is heading down a path where it is willing to undercut our allies and cave in to Russian demands on vital national security matters".[841] John Boehner (R-OH) remarked that the decision "shows wilful determination to continue ignoring the threat posed by some of the most dangerous regimes in the world",[842] and Mitch McConnell (R-KY) that it was "short-sighted and harmful to our long term security interests".[843] In addition to this, many Republicans were unhappy with how the decision was handled. In particular, they believed that the timing of the decision, which could have been announced as part of the Ballistic Missile Defense Review (in February 2010), was politically driven by a desire to downgrade US BMD plans in order to enlist Russian help in dealing with Iran.[844]

By the end of Obama's first year in office, the new president had been forced to rethink many of the changes he had hoped to instigate a year earlier. In this sense, the Phased Adaptive Approach to BMD in Europe was a direct result of the failure of the Obama administration's diplomatic approach to resolving the threat from the suspected Iranian WMD programmes. It was also a reflection of a compromise between Obama's wider agenda and the strong desire on the part of the administration not to appear to be baying to Russian pressure, and the perceived need to retain credibility in the face of the growing threat from Iran.

[840] "Technical, political hurdles await Obama missile plan", *Defense News* (28th September 2009)
[841] Quoted in "White House debuts four phase plan for European missile defense", *Global Security Newswire* (18th September 2009)
[842] Quoted in Peter Baker, "White House scraps Bush's approach to missile shield", *New York Times,* (18th September 2009)
[843] Quoted in Harvey (October 2009)
[844] Confidential Interview (D)

2010: The Ballistic Missile Defense Review and New START

At the start of 2010, two interesting developments seemed to suggest contradictory dynamics for the future of BMD policy under Obama. The first was the nomination of long-term missile defence sceptic and critic, Phillip Coyle to become a top White House Senior Science Advisor, and the second was the release of the Ballistic Missile Defence Review (BMDR), which one former official from the George W Bush administration would later describe as "the most pro-missile defense document by a Democrat since Lyndon Johnson."[845] Compounding this uncertainty was the central role of US missile defence plans as a major potential stumbling block in the nuclear arms reduction talks with Russia.

Despite being unable to restructure the BMD programme as much as he might have liked in 2009, the decision to appoint Phillip Coyle as White House Science Adviser for National Security and International Affairs, suggested that Obama remained keen to rationalise and scrutinise the programme. In fact, Coyle made his thoughts on BMD clear in February 2010, in a statement to the House Armed Forces Subcommittee on Strategic Forces:

> In my view Iran is not so suicidal as to attack Europe or the United States with missiles … but if you believe that Iran is bound and determined to attack Europe or America, no matter what, the I think you also have to assume that Iran would do whatever it takes to overwhelm out missile defenses, including using decoys to fool the defenses, launching stealthy warheads, and launching many missiles, not one or two.[846]

John Noonan claimed that Coyle viewed missile defence as "theology, not a technology",[847] and concerns about the implications for US missile defence plans would mean that Coyle's appointment would be strongly opposed by Republicans.[848] BMD supporters were particularly concerned that

[845] Interview with Eric Edelman (20th July 2010)
[846] Josh Rogin, "Obama chooses missile defense critic for advisory post", *Foreignpolicy.com,* (28th October 2009)
[847] Ibid. Noonan also remarked "If theology has crept into the missile defense debate, Coyle is the high priest of nay saying".
[848] Republicans opposed Coyle's nomination because he had a long history of opposition to US missile defence plans. According to John Noonan, "To date, President Obama's nominations to key defense postings have been mostly pragmatic, starting at the top with the retention of Secretary Gates. However, in the instance of Philip Coyle - nominated to fill the associate director of national security and international affairs spot in the Office of Science and Technology Policy - the administration whiffed. Coyle, a long time opponent of ballistic missile defense (dating back to Reagan's SDI days), is an ideologue whose appointment could prove harmful to U.S. security. See John Noonan, "Obama nominates missile defense critic to key White House spot", *The Weekly Standard,* (4th March 2010).

Coyle would cut funding for the GBI system – which failed its first test under the Obama administration on 31st January 2010, marking the eighth time (out of 15) that such a test had failed since October 1999[849] – or decide not to develop the later versions of the SM-3 missile needed for the Phased Adaptive Approach in Europe.

However, in February 2010 the administration released the Ballistic Missile Defense Review (BMDR) Report. When taken together with the Quadrennial Defense Review (QDR), and Nuclear Posture Review (NPR) Reports, the BMDR seemed to suggest that BMD would become an even bigger component of US national security thinking throughout the rest of Obama's presidency. The two most important components of the BMDR were the reaffirmation that the Ground-Based Interceptor missiles currently deployed were sufficient to combat the long-range missile threat, and the announcement that the administration would focus its efforts on deploying Phased Adaptive Approaches to missile defence in different regions throughout the world.[850] The BMDR also revealed the importance placed by the Obama administration on multilateral and bilateral BMD cooperation internationally as one of the six main goals of the US BMD programme:

(1) Continue to defend the homeland against limited ballistic missile threats

(2) Defend against regional missile threats to US forces, allies and regional partners

(3) Deploy capabilities only when proven through testing

(4) Ensure commitment to new capabilities is fiscally sustainable over the long run

(5) Ensure the programme is flexible enough to adapt as threats change

(6) Seek to lead expanded international efforts on missile defence.[851]

[849] "Ballistic Missile Defense Flight Test Record", *Missile Defense Agency,* http://www.mda.mil/global/documents/pdf/testrecord.pdf
[850] See "Ballistic Missile Defense Review Report", *US Department of Defense,* (February 2010)
[851] Adapted from the "Ballistic Missile Defense Review Report", *US Department of Defense,* (February 2010) iii-v

The Report declared that the "United States possesses the capability to counter the projected threat from North Korea and Iran for the foreseeable future" and because of this "the United States will pursue a Phased, Adaptive Approach to missile defense with each region that is tailored to the threats and circumstances unique to that region."[852] These approaches would then be:

> Tailored to the unique deterrence and defense requirements of each region that varies considerably in geography, in the history and character of the threat, and in the military-to-military relationship on which to build cooperative missile defenses.[853]

As such, the administration would seek to pursue incremental BMD policies in Europe, the Greater Middle East and in East Asia, which would be achieved partly by building upon current cooperative BMD relationships with countries like Japan, Israel and Australia, but also by a substantial expansion of the US programme. The idea would then be to have a "surge capacity" that could be used to address problems across the globe whenever and wherever they arose.[854] In order to fund these plans, the administration requested $8.4b for the Missile Defense Agency for fiscal year 2011, including $1.6b for the Aegis system, $859m for THAAD and $1.3b for the GBI.[855]

The BMDR, the first official and public review of US missile defence policy, provided a detailed overview of what the Obama administration was trying to do with BMD and why. It reiterated the administration's commitment to maintain and improve (but not expand) protection of the homeland, and to focus on regional and short-range missile threats. Perhaps most importantly, it made it clear that such deployments would only be made once the technology had proven itself and with the consent of US allies.

The negotiation of a new wide-reaching strategic arms reductions agreement with Russia had been a central component of Obama's foreign policy agenda right from the start of his presidency, and was one of the reasons why the president decided to cancel the Bush administration's Third Site BMD

[852] Ibid vi
[853] Ibid 22
[854] "Ibid 24-27
[855] Amy Butler, "MDA budget continues Aegis, Thaad focus", *Aviation Week & Space Technology,* (2nd February 2010)

plan in Europe. However, despite continued pressure from Moscow, Obama had gone to great lengths to ensure that the new Treaty would not limit US missile defence plans. Michael McFaul, Special Assistant for Russian and Eurasian Affairs commented: "we are not going to reassure, give or trade anything with the Russians regarding NATO expansion or missile defence".[856]

When the New START Treaty was signed on 8th April 2010 in Prague, it would limit both the US and Russia to 1,550 deployed nuclear warheads and 800 delivery vehicles; nearly two-thirds less than the original START and 30% lower than the 2002 SORT Treaty, and most importantly did not directly mention BMD. Moreover, according to one senior official, "the only limit on missile defense in the Treaty is a good one. That is not having ICBMs in BMD silos and vice versa … as this could create huge confusion".[857] Although Russian President Dmitri Medvedev continued to warn that missile defence remained a point of contention, and reserved the right to leave the Treaty should Russia feel threatened strategically by US BMD plans, Obama made it clear that the Treaty would not impinge upon freedom of action in the US missile defence programme.[858]

Nevertheless, in Congress, Republicans remained suspicious of the administration's motives and concerned about Obama's BMD plans, and Senators John McCain (R-AZ) and John Kyl (R-AZ) warned that Russia's unilateral statement on the Treaty, "had the potential to constrain improvements to US missile defenses."[859] Baker Spring suggested that Obama was tacitly trying to recreate the ABM Treaty by re-linking arms control and BMD.[860] However, one senior official commented that "the Republican challenge is purely political … it is a deliberate ploy to attack the president in an election year and not allow him a big foreign policy success … if this had been done by a Republican president it would have already passed."[861]

[856] "Administration Reiterates Commitment Not To Trade Away Missile Defense", *Nukes of Hazard,* (3rd February 2010)
[857] Confidential Interview (A)
[858] "Remarks by President Obama and President Medvedev of Russia at New START Treaty Signing Ceremony and Press Conference", Prague Castle, Prague, The White House Office of the Press Secretary, (8th April 2010)
[859] Megan Scully, "GOP says Treaty might imperil missile defense", *Global Security Newswire,* (12th April 2010)
[860] Interview with Baker Spring (30th June 2010)
[861] Confidential Interview (A)

While negotiations were evolving over New START, the Pentagon wasted little time in pursuing the BMD strategy outlined in the Ballistic Missile Defense Review, and consequently just a few weeks after the Report was released, it was confirmed that in Europe, Romania would host the first deployment of land-based "Aegis ashore" SM-3 interceptor missiles in 2015, and that Poland would host the next site in 2018. Moreover, according to Undersecretary of State for Arms Control and International Security Ellen Tauscher, both sites would also get upgrades in 2020.[862] A few weeks later, in East Asia, South Korea announced that it was willing to participate in a regional response to North Korea's missile threat,[863] while in the Middle East, it was announced that the US would be fielding additional Patriot missile interceptor batteries in nations neighbouring Iran.[864] The administration also sent Aegis warships to begin maintaining a continuous presence in the Persian Gulf waters to provide a buffer against potential Iranian retaliation resulting from the imposition of new economic penalties relating to Teheran's nuclear programme.[865]

On 15th April, Bradley Roberts, Deputy Assistant Defense Secretary for Nuclear and Missile Defense Policy, told members of the House Armed Services subcommittee that the Obama administration intended to provide full missile defence coverage of Europe against possible missile attack from Iran, within eight years.[866] At the same hearing, Lt Gen Patrick O'Reilly told Congress that the new START Treaty "actually reduces constraints on the development of the US missile defence program" as they would allow tests prohibited under the 1991 agreements.[867]

With the international and diplomatic aspects of the agreement successfully completed, attention now turned to the domestic debate over treaty ratification in the US. President Obama submitted the Treaty for the Senate's consideration on 13th May 2010. Anticipating that Republican

[862] Tom Collina, "US taps Romania for missile defense", *Arms Control Today*, (March 2010)
[863] "South Korea said ready to discuss ballistic missile defenses", *Global Security Newswire* (18th February 2010)
[864] These would be deployed in Bahrain, Kuwait, Qatar and the United Arab Emirates.
[865] "Missile defense deployments ramped up around Iran", *Global Security Newswire* (1st February 2010)
[866] "Ballistic Missile Defense and New START Treaty fact sheet", *US Department of State Bureau of Verification, Compliance and Implementation*, (21st April 2010)
[867] Ibid

lawmakers might try to attack the administration and undermine the Treaty, Secretary of Defense Robert Gates unequivocally declared in a May 2010 *Wall St Journal* op-ed that:

> The Treaty will not constrain the U.S. from developing and deploying defenses against ballistic missiles, as we have made clear to the Russian government. The US will continue to deploy and improve the interceptors that defend our homeland – those based in California and Alaska. We are also moving forward with plans to field missile defense systems to protect our troops and partners in Europe, the Middle East, and Northeast Asia against the dangerous threats posed by rogue nations like North Korea and Iran.[868]

Gates, Secretary of State Hilary Clinton, other senior Obama Administration officials, as well as numerous other foreign policy specialists, would continue to firmly reject claims that the Treaty in any way limited US missile defence plans.[869]

Nevertheless, leading Republicans would spend most of the summer questioning the Treaty, focussing their attacks on the implications for US missile defence plans, and on ensuring that investments would still be made in the US nuclear stockpile.[870] Despite this political pressure, on 16th September 2010 the Treaty passed the Senate Foreign Relations Committee by 14 votes to four. After a prolonged battle between the president and the Republican Party leadership – during which several amendments were agreed; such as ensuring that all four phases of the Phased Adaptive Approach would be deployed, and that future money for the US nuclear weapons complex would be guaranteed, the full Senate gave its advice and consent to the Treaty by 71 votes to 26 on 22nd December 2010.

Despite refusing to use BMD as a bargaining chip in negotiations over New START, and despite plans to push ahead with a variety of different missile defence systems, Republicans and other missile defence advocates remained sceptical and concerned about where the programme was heading as the US approached the mid-term elections of 2010. Obama's BMD plan remained inherently flexible and highly dependent on developments in threat and technology, and thus liable

[868] Robert Gates, "The case for the New START Treaty", *The Wall Street Journal*, (13 May 2010)
[869] See for example, Senate Foreign Relations Committee, hearing on the New START Treaty, with Secretary of State Hillary Clinton, Defense Secretary Robert Gates, and Joint Chiefs of Staff Chairman Adm. Michael Mullen, (18th May 2010)
[870] Tom Collina, "US taps Romania for missile defense", *Arms Control Today*, (January/ February 2011)

to change in the future. Nevertheless, it looked likely that policy would continue on a general upward trajectory as the threat from Iran and North Korea continued to mount.

(3) Assessing the drivers of policy, 2009-2010

Advances in particular technologies and the mounting threats from Iran and North Korea broadly explain why the US BMD programme continued to move forward during this period. However, they do not explain many of the policy decisions made during 2009 and 2010. In particular, they do not explain why Obama did not downgrade BMD in order to allow for better relations and nuclear reductions with Russia. Neither do they explain why Obama committed the US to comprehensive future deployments before some of the technologies had even begun testing. Much of the explanation for these decisions can be found in domestic politics.

International and technological factors

The inability to successfully counter, stop or reverse the suspected Iranian and North Korean WMD programmes were important reasons why missile defence was retained as a key component of national security strategy during 2009 and 2010. The growing threat from these sources made it much more difficult to make significant inroads into BMD spending, or in particular, for Obama and his Democratic allies in Congress to cancel entirely the proposed expansion of the system to Europe. These systemic dynamics also largely explain the renewed focus of the missile defence plan for Europe, the central tenets of the Ballistic Missile Defense Review, and the apparent need to focus on short-range missile threats to troops and allies in unstable regions across the globe. However, international pressures do not explain why Obama continued to pursue a policy that appeared to make resetting relations with Russia that much more difficult.

To some extent, these developments can be explained by technology. For example, Obama's desire to rely more upon and prioritise the Aegis and SM-3 systems was certainly driven by the fact that they were proving more successful than the GBI. This was also arguably the reason why these systems would become the centrepiece of the Phased Adaptive Approach for Europe. What is more, according to the Obama administration, the focus of the programme was shifted towards battlefield and theatre defences precisely because the assets that had been deployed by the Bush administration were believed to be currently sufficient to combat any new near-term threat. Nevertheless, technological advances do not explain why Obama unveiled a new comprehensive missile defence plan for Europe before many of the assets had been tested, or why he was so determined not to limit US BMD in order to secure Russian agreement on the New START Treaty. Above all, neither international developments nor significant technological advances explain the considerable shifted in Obama's BMD thinking during these two years.

Domestic factors

In order to understand why policy evolved in the manner in which it did during this period, examination must be made of the interplay between the often competing presidential and Congressional policy agendas. In particular, it is only through a more detailed understanding of domestic influences, particularly the pressure from the Republicans in Congress, that Barack Obama's policy decisions can be understood. Essentially, Obama's decision to replace rather than cancel the BMD plan for Europe, and the choice not to use BMD as a bargaining chip in the New START negotiations, owe much to the perceived domestic pressure on the his administration.

The first key explanatory variable for policy during this period was the thinking and strategy of Barack Obama. In particular, it was Obama's plan to reorient the US BMD programme towards prioritising the best-performing technologies in order to address the most pressing threats. Consequently, it would be this thinking that would underpin both the Phased Adaptive Approach

for Europe through the use the SM-3 and Aegis rather than GBI systems, and the Ballistic Missile Defense Review, which would see strategy largely redirected toward addressing regional threats through multilateral BMD architectures. A secondary result would be the cancellation of the spiral development deployment programme and the termination of several programmes classified as being too futuristic. To an extent, Obama was helped in this quest by Democratic control of Congress, although the Republican Party fought hard against this change of plans.

The fact that Obama was unable to make the changes to BMD that he had advocated during the election was also a direct result of domestic pressures. As he entered office, it appeared that the president did not want to use up political capital fighting battles over missile defence – especially when his wider programme included many other politically divisive policies. As such, and even though Democrats would retain control of both Houses of Congress during this period, pressure from Republican lawmakers remained a key shaper of policy. As mentioned above, the perceived need not to look weak domestically, or indeed appear to be bending to Russian pressure, underpinned the decision to replace rather than cancel missile defence in Europe, and to ensure that US BMD plans were not hampered by the New START Treaty. In this sense, it was both the centrality of *domestic political actors*, namely Obama's missile defence agenda, and the actions of the Republican Party – for largely *domestic political reasons* – that shaped policy during this period.

Conclusion

Although Barack Obama was the first US president to enter office with a national missile defence system already in place, the first two years of his presidency saw a return to the highly partisan debates that had surrounded BMD during much of the previous two decades. It was in this context that the US ballistic missile defence programme would again expand and appear to become even more central to US national security thinking. As such, what makes this period particularly

interesting is the apparent inability of the president to rationalise and relegate the importance of BMD, despite the fact that missile defence often appeared inconsistent with his wider foreign policy agenda. The reason for this – much as it was with President Clinton a decade earlier – was the considerable political pressure brought to bear on policy by Republicans in Congress, but it was also a reflection on how far the debate had transformed since 1989. Effectively, Obama settled on a policy in order to disarm attacks from Republicans in Congress, but also because he believed that a revamped BMD plan for Europe could be combined with US-Russian nuclear reductions.

While Obama's missile defence plans were driven by strategic pragmatism, they were also a reflection of the domestic political context within which he was acting. The perceived need to neuter Republican led attacks on his policy decisions – which themselves were at least partly inspired by domestic party political dynamics – was a key reason why Obama retained a missile defence plan for Europe, and did not use BMD as a bargaining chip in New START negotiations. However, these decisions were also a direct reflection of the president's inherent flexibility with missile defence, as – much like George H. W. Bush – he gradually adopted a policy that was as much a reflection of other domestic and international priorities as it was about missile defence. In this sense, it was both awareness of the domestic political context within which he was acting and of what type of BMD plan would not hamper the relationship with Russia, which underpinned Obama's BMD thinking. The fact that Obama felt under enough pressure from Republicans to condition his plans on the domestic debate, despite Democratic control of Congress, was a direct reflection of how Obama – like Clinton a decade before him – was determined to depoliticise an issue that the Republican Party appeared keen to use against him. Although Pavel Podvig of the *Bulletin of Atomic Scientists* would describe this policy of balancing Republican and Russian criticisms as one of "appeasement",[871] the balance struck between missile defence and New START ensured that Obama would have the types of defences he wanted, achieve nuclear cuts with Russia, and avoid Republican opposition, all at the same time.

[871] Pavel Podvig, "The false promise of missile defense", *Bulletin of the Atomic Scientists,* (14th September 2009)

At the 2010 mid-term elections, it appeared that the US BMD programme was alive, well, and thriving. Much – such as agreements to multilateralise the system in Europe within NATO, and the defeats suffered by Democrats in Congress – suggested that the pace of deployment would continue throughout the rest of Obama's presidency. Despite this, it remained unclear as to the actual capability of many of the systems that had been deployed, particularly the national missile defence system, while no new ballistic missile threat to the US homeland had appeared in 20 years. Nevertheless, as David Burns remarked, the debate had shifted considerably, and BMD had become a normalised part of US national security thinking:

> Ironic as it seems, it may be that the first year[s] of the Obama administration did more to make missile defense politically acceptable than eight years of efforts by the Bush administration.[872]

[872] Burns (2010) 153

Conclusion

Since the end of the Cold War American policy and thinking on ballistic missile defence has been completely overturned. During this period, the domestic debate about BMD progressed from the zero-sum political battles over the Strategic Defense Initiative between 1983 and 1989, through attempts first to fundamentally downgrade the quest for national missile defence and then resurrect it during the 1990s, before the ABM Treaty was abrogated and deployments began being made in the 2000s. As such, domestic political thinking about BMD moved from fierce disagreements over the necessity and feasibility of constructing a nationwide missile defence system during the presidency of George H. W. Bush, towards a position whereby differences of opinion about the programme had essentially moved to the margins, and focused on the pace, shape and capabilities of particular deployments under Barack Obama.

This thesis has presented a comparison of thinking and policies of George H. W. Bush, Bill Clinton, George W Bush and Barack Obama on BMD. It demonstrates how thinking and strategy has varied between presidential administrations and between Democratic and Republican presidents. George H. W Bush was pragmatic, and saw the Strategic Defense Initiative as a useful policy both internationally and domestically, but did not see missile defence as a top priority. It was for this reason that the programme faltered between 1989 and 1993. Bill Clinton entered office with very little interest in BMD beyond developing battlefield defences for US troops overseas, and remained firmly committed to the Anti-Ballistic Missile Treaty as the cornerstone of US-Russian relations and thus international stability. These dynamics remained central to Clinton's thinking during his second term as he strove to find a balance between BMD, the ABM Treaty and perceived domestic and international political requirements between 1997 and 2001. George W. Bush had very different ideas, and was determined from the start to push ahead with an integrated missile defence programme, regardless of international opinion. Consequently, Bush would drive the

programme forward and ensure that BMD became a central and largely accepted component of US security policy by the time he left office in 2009. Faced with this legacy, Barack Obama strove to normalise policy and place more emphasis on theatre missile defence systems, but oversaw considerable continuity of what had gone before.

While policy was certainly a reflection of each president's particular political agenda, it was also the result of the shifting political space within which policy was conducted during this period. For example, George H. W. Bush was hampered in what he could accomplish by the zero-sum nature of the debate in 1989, while Barack Obama was limited in what he could achieve by the fact that BMD deployment had essentially become accepted or even normalised by 2010. In between this, Bill Clinton was forced to change his plans because of shifts in the contours of the debate during the 1990s, while George W. Bush actively altered the political context within which the policy was debated by pushing the programme forward during the 2000s. It was the gradually changing confines of this political context – fashioned by systemic, technological, and at times, domestic factors – that progressively shaped the political space within which policy was debated and formulated.

In terms of Congress, there were two broad schools of thought on ballistic missile defence in 1989. One group firmly believed that the US should seek to develop and deploy all types of ballistic missile defences as soon as possible, and that agreements such as the ABM Treaty were inhibiting the ability of policymakers to ensure US security. The centre of gravity for this group was in the Republican Party and a few conservative think tanks in Washington DC, such as The Heritage Foundation and The Center for Security Policy. The second group were far more sceptical of the feasibility, desirability and strategic wisdom of deploying missile defences, although were not necessarily against the deployment of theatre missile defences, or defences commensurate with the ABM Treaty, which they regarded as the cornerstone of international stability. The centre of gravity for this group was in the Democratic Party and within the "arms control" community, and

included; The Union of Concerned Scientists, The Federation of American Scientists, The Council for a Livable World, The Center for Defense Information and the Arms Control Association.

While this highly partisan split never went away between 1989 and 2010, the two poles of the BMD debate did gradually converge, with both parties moving towards a rough position of consensus around the need for both tactical and national defence by 2010. In this sense, the years between 1989 and 2010 would see a gradual convergence in political and strategic thinking to the point whereby only limited and peripheral disagreements existed about US ballistic missile defence plans. Nevertheless, the development in policy and thinking over this period has been nuanced. In particular, it is important to point out that a bipartisan agreement over the need for battlefield missile defences has been present throughout each of the six administrations since the end of the Cold War. It is also important to note that both the technology required for such a task – due to the lesser demands placed upon such systems, and the diplomatic aspects of deploying them[873] – have been far less controversial than national missile defence. In addition to this, the evolution of policy has shown that the missile defence debate has arguably been as much about the ABM Treaty and the changing nature of the relationship with Russia after the Cold War, and about balancing these pressures with the growth in new sources of threat to US security, than is has been about BMD. The result is that most of the debate during this period has been about national missile defence, and whether either threat or technology justify the financial, political and strategic costs of deployment.

This thesis makes two central and important contributions to the literature on US ballistic missile defence policy. First, it contributes a systematic explanation of why US BMD policy evolved as it did between 1989 and 2010, to the rich tradition of analysing domestic political determinants of security policy. Second, it provides a nuanced analysis of the impact of domestic political dynamics able to differentiate the impact of *domestic political actors*, such as the president and

[873] This was because they were legal under the ABM Treaty and were therefore not considered a threat to the stability of nuclear deterrence. After the Treaty was abrogated in 2002, the US was free to develop and deploy whatever type of systems it wished.

Congress, from actions taken for *domestic political reasons*, and explores the interaction of domestic variables with broader changes in the international system and technological capability. By doing this, the thesis bridges the gap between the literature on the domestic determinants of security policy and the evolution of the contemporary US ballistic missile defence debate, and provides a systematic analysis of a phenomenon which has so far escaped a comprehensive explanation.

This thesis makes two central and important contributions to our understanding of US ballistic missile defence policy. First, that *domestic political actors* – referring to the president and Congress – often but not always acting for *domestic political reasons*, have been central to the evolution of policy between 1989 and 2010. Second, that the confines of the missile defence debate shifted over time due to gradual improvements in technology and changes in international systemic pressures, and because of the interaction of domestic, international and technological influences. As such, the transition from the zero-sum debates that surrounded the programme in 1989 to the general acceptance of BMD amongst the US policy community by 2010 can be understood as a product of day-to-day domestic political influences, but also of the shifting domestic political space within which this debate occurred.

The key argument of this thesis is that domestic political influences have been far more important to the evolution of US missile defence policy than has previously been acknowledged. There are two main components to this. Firstly, that *domestic political actors* have been central to the missile defence story, and secondly, that these actors have often made policy decisions for *domestic political reasons*. In this sense, it is the importance of the actions of both the president and Congress in their own right, as well as the underlying motivations for these policy choices, that are important to understanding US missile defence policy at any given time between 1989 and 2010. By doing this, the thesis moves beyond the limitations of current policy-orientated and academic research on contemporary US missile defence policy, and provides a significant contribution to the literature.

In terms of *domestic political actors*, the political policy choices of the president, the party in control of Congress, and the political balance between the executive and legislature, was central to the day-to-day rhythms of policy. The thesis has shown that Democratic presidents and lawmakers have generally tended to favour restraint, while Republican presidents and lawmakers have been far keener to push ahead with ballistic missile defence. This has generally held true throughout the period under study, with Bill Clinton and Barack Obama appearing to be far less enamoured by BMD than George H. W. and George W. Bush.

The institutional balance between president and Congress has also been important. The thesis shows how particular president's BMD plans have been constrained or enabled by a sometimes compliant but other times hostile Congress. Again, the thesis shows that Republican president's faced with a Democratic Congress – such as George H. W. Bush between 1989 and 1993, and George W. Bush during early 2001 and between 2007 and 2009 – have found it much harder to push ahead with their particular policies than in times when the Republican Party has controlled Congress. Likewise, Democratic president's faced with Republican controlled Congresses – such as Bill Clinton between 1995 and 2001 – have found their attempts to rein in and limit BMD policy considerably more difficult than when the Democrats have controlled the legislature. That said, the thesis suggests that Republican president's and lawmakers have been more successful in altering BMD policy than their Democratic Party counterparts – a dynamic that has much to do with the changing nature of the debate during this period – but also to the enduring nature of the ballistic missile defence programme.

The second key component of this argument is that each of the presidents looked at in this thesis often made BMD policy decisions for *domestic political reasons*. George H. W. Bush undoubtedly wanted to retain a comprehensive ballistic missile defence programme to placate conservative members of the Republican Party between 1989 and 1993; Bill Clinton unveiled a national missile defence deployment plan in 1996 in an attempt to neuter pressure from the Republican Party, and would continue to drift towards deployment between 1997 and 2001 at least

partly because of these perceived domestic requirements. George W Bush pushed ahead with BMD deployments in order to ensure that they would survive his presidency and could not be undone by any future Democratic president less convinced of the benefits of BMD; while Barack Obama did not cancel the plan to deploy missile defences in Europe in part because he wished to avoid confrontation with a Republican controlled Congress. In this sense, presidential decision-making on BMD has often reflected the perceived necessity of political positioning both within the president's own party, and relative to the specifics of the domestic political debate at any given time.

Domestic political reasons have also been central to the particular stance taken on BMD by Republicans and Democrats in Congress during the period looked at in this thesis. Broadly speaking, the Republican and Democratic Parties have provided the intellectual home of two separate schools of thought on BMD, with Democrats largely opposed to BMD, and Republicans largely all for. While the polarisation of opinion within each political party can be explained in part by the particular beliefs of Congressman regarding their sincere assessment of the need and desirability of missile defences, the issue has often been driven by primarily party political dynamics. For example, Democrats went along with the 1991 Missile Defense Act partly because they were concerned about being attacked as weak on defence following their reluctance to support the 1991 Gulf War; similarly, in 1994 many Republicans went along with the pledge to deploy national missile defences in the Contract with America because it was seen as a way of attacking president Clinton. This rationale would continue to play an important role in Republican thinking throughout the 1990s, notably in Bob Dole's 1996 presidential election campaign, and following the Monica Lewinski scandal in 1998. Equally, the Democratic leadership attempted to use the issue of BMD (with limited success) as a means to rally the party against President George W Bush in 2001, 2004 and 2006. Finally, the commotion caused by Republican Congressman over President Obama's decision to end the Third Site plan for Europe, and negotiation of the New START Treaty, owe much to the desire of Republican lawmakers to prevent Obama from achieving a foreign policy

success. In fact, one official later claimed that if a Republican president had taken these actions they would have passed through the Senate with little debate.[874]

The impact of "domestic politics" on the missile defence debate has therefore been nuanced, with considerable pressure being generated by *domestic political actors*, quite often, but not always, for *domestic political reasons.* Consequently, to understand why policy was as it was at any particular point between 1989 and 2010, it is fundamental to understand the particular balance of domestic forces and dynamics at that time. By demonstrating the centrality of domestic political dynamics to the evolution of the US BMD policy, this thesis moves beyond the literature that has either overlooked or downplayed the role of domestic influences in analyses of why presidents have often appeared to pursue policies not of their own making.

The second central argument of this thesis is that the day-to-day domestic political debate over BMD has altered fundamentally during this period due to developments in technology and changes in the international system, and because of the interaction of these factors with domestic political dynamics. It shows how a gradual and punctuated convergence between the requirements for a US missile defence system and the technology to achieve such a defence, progressively altered the political space within which BMD policy was being fought over. While the evolution of these factors was neither linear nor smooth between 1989 and 2010, the BMD debate shifted considerably from a position in 1989 whereby the technology did not exist to justify any deployment – let alone to counteract a large scale nuclear strike by the Soviet Union, to a point in 2010 whereby various systems had been deployed to counteract a rogue state attack on the US homeland, and missile threats to troops on the battlefield. In this sense, and because of these developments, there was a distinct evolution in the US political context towards acceptance and enactment.

[874] Confidential interview (B)

In 1989, the gap between missile defence capability and the requirements of such a system was vast – the US did not have the technological ability to counteract a large Soviet strike, or indeed to protect troops on the battlefield. As a result, as George H. W. Bush took office the debate was essentially zero-sum, with only a small group of Republican lawmakers and their allies in a few conservative think tanks fervently pushing for the system, and with Democrats, and their allies in the "arms control" community, staunchly opposed to funding BMD, let alone thinking about deployment. By 1993, with the demise of the Soviet Union and the growing acceptance of a new regional and battlefield missile threat from rogue states, the debate had shifted. However, and while these developments cemented a bipartisan consensus over the need for battlefield missile defences that would remain throughout this period, the gap between requirements and capability remained large. Specifically, as the debate over the performance of the Patriot missile defence system during the 1991 Gulf War would later highlight, the technology required to meet even the new rogue state battlefield missile threat did not exist. By 1996, this had essentially changed little, and the gap between requirements – which were still limited at this time – and capability, remained substantial. In fact, until 1996 the Clinton administration did not even have an NMD deployment plan, partly because the technology to do so appeared so far away. The gulf between these factors was a key reason why the Republican Party would find it difficult to force President Clinton to commit his administration to a national missile defence deployment decision during the 1990s.

By 2001, the contours of the debate had altered further. The North Korean missile launch and Rumsfeld Report in 1998 heightened the sense of threat – and the perception of its proximity in both Congress and the White House – and paved the way for more attention and funding for BMD. Moreover, while various missile defence technologies continued to experience problems, the growing awareness of Iranian, Iraqi and North Korean WMD programmes essentially transformed the central tenets of US national security thinking. Politically, these developments lessened Democratic opposition, and brought about a loose agreement over the need for some type of national missile defence deployment in the future. Strategically, they helped tip the focus of US

policy away from Russia, MAD and the ABM Treaty, and towards missile defence and the rogue state missile threat.

As George W. Bush began his second term in office in 2005, the debate had shifted further. Primarily this was because the terrorist attacks of 9-11 – building on the shifting nature of the threat during the 1990s – had provided the opportunity for Bush to abrogate the ABM Treaty and begin deployment, and thus establish a structural legacy that any future administration would find it difficult to reverse. Abrogating the ABM Treaty also paved the way for more comprehensive BMD testing and development; the integration of different BMD technologies into one ballistic missile defence system, and in 2006 negotiations about expanding the system to Europe. The result was that the debate shifted away from disagreements focussed on whether to push ahead with deployment, towards less heated discussions about which assets to deploy and how to deploy them. Consequently, by 2010, President Obama had essentially accepted that the US both needed a BMD system to counter a growing range of threats from Iran and North Korea, and that the technology to achieve this goal was largely available, as was reflected in the 2010 Ballistic Missile Defense Review. As a result, and while debate remained at the margins at the end of this period, a majority bipartisan consensus existed around the need for both national and battlefield missile defence by late 2010.

Fundamentally it was the changing nature of what a US ballistic missile defence system must be able to do – in terms of the threat it was designed to counteract – and the gradual improvements in the ability to achieve this – through developments in BMD technology and engineering – that explain the general trajectory and day-to-day context of the missile defence debate between 1989 and 2010. In terms of politics, changes in these factors altered the parameters of the domestic dispute over BMD by moving the Democratic/ sceptical position closer to acceptance. In short, the fact that the threats to be addressed had become smaller (i.e. it was no longer about Russia), while the technology had become more capable, had persuaded most of the sceptics who had been staunchly opposed to the SDI in 1989 to support limited versions of BMD by

2010. At the same time, the centre of gravity within the Republican Party and amongst BMD enthusiasts had shifted to a position whereby very few continued to openly advocate a comprehensive space-based defence such as envisaged in the Strategic Defense Initiative. As such, Barack Obama's first term in office arguably represented the culmination and convergence of these two dynamics, which was a direct reason why Obama, a Democratic president, appeared to embrace BMD, and in some respects even expand the programme during 2009 and 2010. By doing this, the thesis makes a second important contribution to the literature on ballistic missile defence.

The story of the US ballistic missile defence debate between 1989 and 2010 is also a co-constitutive reflection of wider changes in US security thinking after the Cold War, especially as regards the relationship with Russia, international stability and nuclear deterrence. It is the story of how different domestic actors sought to control and react to the enduring legacy of the Cold War, and to the new international pressures that arose from new sources during this period. Fundamentally, the missile defence debate was a direct reflection of a gradual move away from Cold War doctrines of Mutual Assured Destruction and a Manichaean stand off with the Soviet Union, towards a new strategy based upon a balance of nuclear weapons and missile defences to meet new deterrence requirements in an ever-changing post-Cold War world.

The punctuated evolution of the US missile defence debate was essentially a reflection of the transition from a world in which Russia was seen as the main threat to, and focus for, US security, to one that was characterised by a very different type of threat from rogue states. This in turn meant a conversion from a world in which Mutual Assured Destruction and the ABM Treaty represented the centrepiece of US national security thinking, to one in which certain flexibility and a new balance of both offensive and defensive weaponry had become the new accepted wisdom of US national security thinking. This adaptation would take the best part of two decades, and it would be within this broader international context that the ballistic missile defence debate would be

played out. Essentially, in 1989, the Russian nuclear threat was considered the primary US security concern, and therefore adherence to the ABM Treaty and not upsetting Russia were considered central priorities, and more important than missile defence. Only once the Cold War was over and its central logic had faded as a strategic reality, and the perceived Russian threat receded, was a move towards utilising BMD against other threats possible. As such, deploying missile defences against rogue state threats only became possible after the central strategic nuclear relationship with Russia faded sufficiently as a component of US security thinking. Therefore, the story of BMD between 1989 and 2010 is about the equilibrium between these two competing logics and rationales; Cold War MAD and its hang over and post cold war, post MAD world. Only time and generational change of the leadership made this transition possible. Only US confidence that Russia wouldn't mind, could live with it, or didn't matter, facilitated this.

Linked in with this transition from the Cold War relationship with Russia towards a position where the main threats to US security had changed considerably, was the ongoing debate about the best way to reduce US and Russian nuclear weapons. All four US presidents since the end of the Cold War entered office determined to make cuts in strategic nuclear weapons, and all but Bill Clinton achieved this. Although each president had slightly different ideas about how this could best be best achieved; George H. W. Bush and Bill Clinton considered the retention of the ABM Treaty central to bilateral arms control agreements, while George W Bush was fully prepared to make unilateral cuts in US nuclear forces in a world without the ABM Treaty, the central dynamic was the way Russia was viewed in US foreign policy and whether or not American policymakers could risk transitioning from a MAD paradigm with Russia and a return to a pre MAD nuclear predicament. George H. W. Bush, Bill Clinton, and to an extent Barack Obama, through negotiations over New START and rhetorically in his Prague speech, decided that this risk was not worth the cost, while George W. Bush, as a way of signalling that the world had moved on, decided that the cost was worth the risk.

The evolution of US missile defence thinking between 1989 and 2010 is also a reflection of a nuanced internal debate about the way in which technology drove and influenced policy. Two technological dynamics in particular stand out. The first is the top-down pressure from the 1983 Strategic Defense Initiative – whereby thinking gradually transitioned from comprehensive space-based BMD to a more limited conception based on assets deployed in silos on the ground. The second is the bottom-up route from battlefield missile defence systems, whereby the US BMD programme in 2010 was essentially a reflection of the steady increases in TMD technology that can be traced back to the Patriot missile defence system used in the 1991 Persian Gulf War. This bifurcation also reflected the debate about what any US BMD system should be designed to do, and it was the gradual harmonisation of these pressures by 2010 that suggested that while international systemic requirements for US security and technology had converged, the downward slope of the SDI and the upward pressure from TMD had also finally been harmonised. Evidence of this could be found in the reliance that the Obama administration had placed on the Aegis and SM-3 systems by 2010, rather than on the 30 Ground-Based Interceptors already deployed in Alaska and California by this point.

Finally, while ballistic missile defence has proved an enduring logic in American politics because of the changes in threat and technology that have developed since the end of the Cold War, it has endured because of the simple logic of missile defence. Defending the nation against enemy attack through ballistic missile defences appears far simpler than the complicated intellectual argument that Mutual Assured Destruction is the best way to manage nuclear competition. In this sense, it has been very difficult for members of the US public to understand why their government would not want to build missile defences if such defences could keep them safe. This dynamic has been exacerbated considerably by the fact that the number of policymakers with genuine knowledge of what is fundamentally an "elite issue" has decreased considerably during the two decades after the end of the Cold War.

The simple logic of missile defence is perhaps nowhere better outlined than in a 1983 speech by the father of the modern US missile defence effort, President Ronald Reagan:

> What if people could live secure in the knowledge that their security did not rest on the threat of instant US retaliation … that we could intercept and destroy strategic ballistic missiles before they reached our soil or that of our allies?[875]

The simplicity of the missile defence argument ensured that the programme retained popular appeal and thus could be played for domestic political advantage throughout this period. This logic never entirely disappeared between 1989 and 2010, and would come back stronger as newer threats and potential threats started to rise, and as ballistic missile defence in general got to be more politically popular domestically, and politically trouble free internationally.

Lawrence Freedman has argued that, "From the start of the nuclear age it has been almost a moral imperative to develop some system that would make it possible to defend against an incoming bomber or missile attack".[876] Despite this fact, it has taken nearly six decades of research, billions of dollars in funding, and numerous different conceptions of how this could be achieved, before a political consensus would emerge behind a US ballistic missile defence system in 2010. While this is certainly a product of the perceived requirements of the international system and of developments in technology and engineering, it is also predominantly because of politics, and the inherently political nature of the US ballistic missile defence debate.

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