# **Overhauling Counterproliferation Intelligence**

# Ashton B. Carter Co-Director, Preventive Defense Project Harvard and Stanford Universities

Statement before
The Commission on the Intelligence Capabilities of the United States
Regarding Weapons of Mass Destruction
(The "Robb-Silberman" Commission)

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Thank you for inviting me to appear before this important Commission. I believe strongly that the work before you is the most important being done in the entire field of national security affairs. It is even more important than the fine work of the 9/11 Commission, because if we fail in our efforts to contain WMD the results will be far worse than the 9/11 attacks.

I am a physicist who began working on defense technology problems during my first tour in the Pentagon in the Reagan administration and quickly focused on WMD issues. You probably know I was later involved in advising Sam Nunn and Dick Lugar on the authoring of the Nunn-Lugar legislation in 1991. In the wake of the first Gulf War I was co-chair of the Intelligence Panel of the Defense Science Board's landmark study on WMD – inspired by the concern that a next major regional conflict might involve a WMD-armed opponent.

In the first Clinton term I served as Assistant Secretary of Defense for International Security Policy, a role centered on WMD issues. I ran the Nunn-Lugar program in the years when Boris Yeltsin fended off several attempted coups and suffered several heart attacks, and during which we successfully denuclearized Ukraine, Kazakstan, and Belarus. I participated in the conception of the Department's Counterproliferation Initiative, which introduced the word counterproliferation into the defense lexicon, and led President Clinton's Nuclear Posture Review. I spent much of 1994 on the first North Korean nuclear crisis. And I founded NATO's Defense Group on Proliferation in an attempt to focus that alliance on WMD issues --- the first defense body in NATO to include the French.

After leaving the Pentagon and before 9/11, I rejoined the government (1998-2000) to serve as deputy to Bill Perry in the North Korea Policy Review. Also during this period, I co-chaired the Commission on Catastrophic Terrorism with John Deutch

and was a chairman of the Defense Science Board's study on Transnational Threats. Both of these efforts were dedicated to WMD terrorism and counterproliferation, did fine work, but did not succeed in catalyzing action against WMD terrorism before 9/11. After 9/11, as you probably know, I was involved in the architecture of the Office of Homeland Security and the Department of Homeland Security.

All this is to say that I have long been concerned with countering WMD in both state and non-state hands, and with the intelligence underpinning that any such effort must have. I have been working intensively on this problem as part of my research in the Preventive Defense Project, the Harvard-Stanford collaboration which I co-chair with Bill Perry, and which is supported by the Carnegie Corporation of New York, the John D. and Catherine T. MacArthur Foundation, the Herbert S. Winokur Fund, and the Richard Lounsbery Foundation. Much of what I have to say today draws on that work.

My opening statement has three parts:

First, I would like to describe how, were I in your shoes, I might frame the work of this Commission in the context of our overall effort to counter WMD (by which I mean mostly nuclear and biological weapons, the others being less threatening).

Second, I will make several recommendations for improving WMD intelligence. These recommendations are drawn in part from discussions the Preventive Defense Project has hosted with senior intelligence community leaders and other knowledgeable people over the past year on a not-for-attribution basis.

Third, I will suggest how I think about the relationship between the specific problem of WMD intelligence and the overall issue of intelligence community reform.

In each of these three areas I hope to get over the bar set in your letter of invitation, which reads, "The purpose of these sessions is for members of the Commission to meet with a variety of individuals to discuss challenges to the Intelligence Community in a semi-informative [sic] environment."

### Needed: A War on WMD

We need an overhaul of the entire policy and programmatic framework for counterproliferation involving both states and terrorists. President Bush has rightly said that the national security establishment's highest priority is to keep the worst weapons out of the hands of the worst people. But so far we are doing much more about the worst people than we are doing about the worst weapons. Since 9/11 we have overhauled counterterrorism, and intelligence has focused in response. But we have not overhauled counterproliferation. We have a war on terrorism, but we are not yet at war on WMD.

In the current issue of *Foreign Affairs* I outline such an overhaul of counterproliferation. It describes the full set of counterproliferation missions that need intelligence support, and the roster of customers that demand that intelligence. It

organizes counterproliferation according to the "8 D's" first introduced in DOD as part of the Counterproliferation Initiative: dissuasion, diplomacy, disarmament, denial, defusing, deterrence, defense, and destruction. The urgent need for an overhaul of counterproliferation across all the 8 D's is a key frame for the work of this Commission.

There is no such thing as an "intelligence failure." All intelligence failures are coupled to policy failures. Conversely, the Commission's efforts to improve WMD intelligence cannot be fully realized unless and until the U.S. government creates a clear and comprehensive counterproliferation policy and program. Intelligence cannot supply the policy customer unless the customer articulates its demand.

A second frame for the Commission's work involves the unique risk calculus associated with WMD. I refer to this in the *Foreign Affairs* article as the "Rumsfeld Challenge." Secretary of Defense Donald Rumsfeld became convinced in the course of his work on ballistic missile proliferation before he took office that adequate intelligence on WMD programs is simply unlikely to be present in many cases. Given the stakes, he concluded, the U.S. must assume the worst in formulating its policy responses. This logic, encapsulated in the maxim "absence of evidence [of WMD] is not evidence of absence," was the main intellectual argument in the Rumsfeld Commission report leading to the deployment of a National Missile Defense. According to this maxim, intelligence regarding the timetable for the development of an intercontinental ballistic missile threat originating in Iran or North Korea was uncertain enough that it was deemed imprudent for the United States merely to be prepared to deploy a missile defense within a few years (the Clinton administration policy), but instead necessary to undertake deployment immediately.

The same logic made a persuasive case for preemptive war in Iraq, a case I believed and supported but we now know to be wrong. It seemed safer to assume Saddam Hussein was trying to fulfill his long-demonstrated quest for WMD than to interpret the scanty intelligence available as evidence of a scanty WMD program.

Obviously one would like to avoid being forced to such worst-case calculations. But WMD activities are inherently difficult to monitor. By their nature, WMD concentrate destructive power in small packages and tight groups. A profound question bearing upon all of the 8 D's is therefore whether adequate intelligence is likely to be available to make any of them effective; or, alternatively, whether WMD spread is by its nature too difficult to monitor. If the latter is true, the world is doomed to a perpetual situation reminiscent of the "missile gap" of the 1950s, where uncertainties outweigh certainties and policymaking is forced into worst-case scenario mode.

The uncertainties of the 1950s missile gap were substantially dispelled by the invention of satellite reconnaissance, by a disciplined analytical effort stretching over decades, and – interestingly – by the tacit cooperation of the Soviets, who, for example, did not shoot down satellites. This is a useful analogy, since all of these features of the cold war intelligence problem have analogues in the recommendations I am about to make.

# **Recommendations for Improving WMD Intelligence**

Over the past months, as I mentioned earlier, the Preventive Defense Project has been conducting a miniature version of the "Plans" half of this Commission's work – devising and analyzing options for improving WMD intelligence and collecting the best thinking of current and past intelligence and national security leaders. Our findings to date fall under five headings:

1. First, emerging technology and techniques with leverage on the WMD problem.

I mentioned that satellite reconnaissance proved to be a high-leverage technology for cracking the cold war's highest-priority security problem. Today, there are some emerging intelligence technologies that will potentially make a substantial, if not entirely comparable, contribution to the collection of quality intelligence on WMD. They are "close-in" technologies as opposed to "from-the-outside-looking-in" satellite photography. Many are forensic in nature. They involve, for example, taking material samples and analyzing them for traces of suspicious chemicals, biological material, or radionuclides. The samples can be taken from the air by aircraft (as with krypton air sampling for evidence of spent nuclear fuel reprocessing) or from the ground (plucking a leaf from a bush, wiping a handkerchief across a countertop) overtly or covertly.

Unattended ground sensors (UGS) with a variety of transducers (chemical, radiological, acoustic, seismic, radio-frequency, imaging, etc.) can be emplaced by hand or dropped covertly from unmanned aerial vehicles. The tiny UGS can do enough onboard data processing that only small amounts of data need to be sent back to intelligence agencies, in turn making it difficult for those being spied upon to detect them. Cellular telephone technology permits clusters of UGS to be networked and their data combined, reducing the rate of false alarms. UGS can even be made mobile by attaching them to robots, animals, or birds.

Another lucrative technique is "tagging," involving the covert placement of identifying features, transmitters, or chemical markers on objects destined for WMD facilities, and then monitoring the tag remotely or by close-in sample collection. Finally, there is a revolution underway in close-in signals intelligence, in which cell phones, laptop computers, local area networks, and other information infrastructure of a WMD program are penetrated and exploited. Miniaturization, as with micro-electro-mechanical (MEMS) devices, is making all these close-in techniques easier. Information from these specialized WMD-specific techniques can be combined with the usual types of intelligence from imagery, intercepted communications, defectors, and the occasional walk-in or truly occasional penetration.

Another high-leverage technology is IT-enabled analytical tools that will allow analysts to "Google" the vast classified – and unclassified – databases that bear on WMD more efficiently and without having to pose in advance a precise question.

A third high-leverage technique is getting into the flow of human talent that fuels WMD programs. Just as we need to track down and watch each and every one of the jihadis trained in al Qaeda's Afghan camps in the 1990s, so also we need to identify each and every individual involved in WMD-related activities – from Pakistan to Russia to Europe. The accompanying actions for intelligence range from attending scientific conferences to mounting sting operations.

- 2. Improve the quality of scientific and technological expertise available to the intelligence community. Since proliferation is essentially a scientific activity, the intelligence community needs to increase the number and level of technical training of its workforce. But we should recognize that even with effort the government will have difficulty recruiting and retaining top technical talent that has more lucrative prospects in private industry. Intelligence agencies therefore need to forge better links to the outside scientific community so that advice and insight are more readily available "on call." An example of this method is the MITRE Corporation's STEP program. Broader ties with the scientific community also aid collection, since, as noted previously, a key "open" source of proliferation intelligence comes from monitoring scientific literature, the training and movement of foreign scientists, and the commerce in scientific equipment.
- 3. Harness intelligence to action. A great spur to quality and motivation in any intelligence effort is a clear link to action and results. Since 9/11, the counterterrorism intelligence effort has become more "actionable" in intelligence terminology. To simplify somewhat, counterterrorism intelligence moved from producing papers characterizing terrorist groups to supporting operations to interdict terrorists. Similarly, an overhauled U.S. counterproliferation program of the kind I argued for earlier will be more operational and will generate more demand for actionable intelligence. If history is any guide, the intensity and quality of collection and analysis by the intelligence community will increase in response to clearer policy and more forceful action.
- 4. Serve the full, new customer set for counterproliferation. To oversimplify, the CIA's proliferation-related efforts used to view the diplomatic community as its principal customer. During the 1990s I tried to get DOD to articulate its demand for threat information to buttress its war planning and its acquisition of vaccines, protective gear, and so forth, and for the Intelligence Community to meet that demand.

In the post-9/11 world the IC should look upon its customer base as extending well beyond State and Defense: to DHS for WMD counterterrorism, to the FBI for supporting domestic collection and counterterrorism, to HHS for bioterror response planning, to DOE for its part of the Nunn-Lugar effort, and even to state and local first responders for their role in dealing with WMD intelligence. All these customers should be served, both by collection and analysis.

5. Use the platform of international cooperation for national intelligence. The debate leading up to the invasion of Iraq pitted arms control inspections against national intelligence, as though the two were alternatives. In fact, if handled properly, the arms

control framework can be used creatively as a platform for national collection. An objective of policy with respect to the Nuclear Nonproliferation Treaty, for example, should therefore be to expand this platform. We should be moving towards an international climate where governments around the world are expected to, and ultimately required to, allow greater access to their territory, facilities, and scientists. At a minimum, governments that wish to avoid suspicion (and thus coercion and even preemptive attack) will need to allow the kind of access promised to U.N. inspectors in Iraq before the 2003 war. Access involves the ability to inspect facilities by surprise, take material samples for forensic analysis, install monitoring equipment, and other physical means. It must be complemented by required data declarations, document searches, and interviews of scientists. These are tall orders, since they involve compromises with sovereignty and legitimate military secrecy for the nations inspected, but they are the only way North Korea's WMD ambitions will be verifiably eliminated, or Iran's nuclear power activities fully safeguarded.

At the same time more openness is required, there must be a shift of the burden of proof from the international community to the party under suspicion. To make an inspection system of carefully managed, if not totally unfettered, access based on active cooperation succeed, it must be the responsibility of the inspected party to dispel concerns, and not the responsibility of the United States or the international community to "prove" that dangerous WMD activities are underway.

I would be pleased to expand further on any of these five recommendations. Implementing all of them will be needed to create an intelligence basis for dealing with America's most important security problem.

# The Relationship Between WMD Intelligence Reform and Overall Intelligence Community Reform

The 9/11 Commission's analysis of the parallel problem of terrorism led it to recommend a sweeping reform of the intelligence community. My five recommendations on the WMD problem do not include one on overall intelligence reform, and you may ask why. We did not find that the logic of the WMD problem per se led us to the need for a National Intelligence Director. Indeed, this idea has been around as long as I can remember, and the problem with it from my point of view has been that I can think of only one or two ways to do it right and six or eight ways to do it wrong. Until recently I have judged that the odds were against doing it right. If it is worth doing, it is worth doing thoroughly – that means fairly robust budget and hire/fire authority for a DNI.

What is the connection to WMD intelligence? I have been on many panels on improving intelligence on one security problem or another, and each one comes up with recommendations such as those I have cited above in connection with WMD. But most times, if the problem in question is at all large, the panel's recommendations are not implemented because there is no one in the IC with the requisite authority to do so. The intelligence function of the U.S. government is not so much *mis*managed as *un*managed. Nowhere do authority, responsibility, and resources come together in tight managerial

focus. Ergo, it may well be that the WMD problem, like the terrorism problem, cannot be tackled unless we create a managerial concept and structure for the overall intelligence function.

Finally, the 9/11 Commission recommended creation of a National Counterterrorism Center to bring operations and intelligence, consumers and producers, together. The question will arise for this Commission whether it supports creation of an analogous counterproliferation center. If the U.S. government overhauls its counterproliferation policies and programs along the lines I recommend, the result will be greater demand for intelligence to support those refocused policies and programs – along the breadth of relevant agencies from Defense to HHS, and through the depth of policy approaches, from diplomacy to covert action to preemption. When that context has been created, a CP center will probably be needed to serve it.

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Once again, thank you for inviting me to meet with you. Our studies of this problem will be continuing, and I would be pleased to meet with you again before your work is completed. Americans regret that that their government did not overhaul its counterterrorism capabilities years before the 9/11 attacks, neglecting reforms that seemed tragically obvious after the World Trade Center was destroyed. Now U.S. counterproliferation programs need an overhaul, and intelligence is a part of that needed effort. It will be unforgivable if counterproliferation's overhaul has to wait until after a WMD catastrophe.

#### THE HONORABLE ASHTON B. CARTER

Dr. Ashton Carter is Co-Director (with former Secretary of Defense William J. Perry) of the Preventive Defense Project, a research collaboration of Harvard's Kennedy School of Government and Stanford University, and he teaches national security policy at the Kennedy School where he is Ford Foundation Professor of Science and International Affairs.

Dr. Carter served as Assistant Secretary of Defense for International Security Policy during President Clinton's first term. His Pentagon responsibilities encompassed: countering weapons of mass destruction worldwide, oversight of the U.S. nuclear arsenal and missile defense programs, arms control, controls of sensitive U.S. exports, policy regarding the collapse of the former Soviet Union (including its nuclear weapons and other weapons of mass destruction), and chairmanship of NATO's High Level Group. He oversaw military planning during the 1994 crisis over North Korea's nuclear weapons program; was instrumental in removing all nuclear weapons from the territories of Ukraine, Kazakstan, and Belarus; directed the establishment of defense and intelligence relationships with the countries of the former Soviet Union when the Cold War ended; and participated in the negotiations that led to the deployment of Russian troops as part of the Bosnia Peace Plan Implementation Force. Dr. Carter oversaw the multi-billion dollar Cooperative Threat Reduction (Nunn-Lugar) program to support elimination of nuclear, chemical, and biological weapons of the former Soviet Union, including the secret removal of 600 kilograms of highly enriched uranium from Kazakstan in the operation code-named Project Sapphire. Dr. Carter also directed the Nuclear Posture Review and oversaw the Department of Defense's (DOD's) Counterproliferation Initiative. He directed the reform of DOD's national security export controls. His arms control responsibilities included the agreement freezing North Korea's nuclear weapons program, the extension of the Nuclear Nonproliferation Treaty, the negotiation of the Comprehensive Test Ban Treaty, and matters involving the START II, ABM, CFE, and other arms control treaties.

Dr. Carter was twice awarded the Department of Defense Distinguished Service Medal, the highest award given by the Department. For his contributions to intelligence, he was awarded the Defense Intelligence Medal. In 1987 Carter was named one of Ten Outstanding Young Americans by the United States Jaycees. He received the American Physical Society's Forum Award for his contributions to physics and public policy.

A longtime member of the Defense Science Board and the Defense Policy Board, the principal advisory bodies to the Secretary of Defense, Dr. Carter continues to serve DOD as an adviser to the Secretary of Defense, a consultant to the Defense Science Board, and a member of the National Missile Defense White Team. In 1997 Dr. Carter co-chaired the Catastrophic Terrorism Study Group with former CIA Director John M. Deutch, which urged greater attention to terrorism. From 1998 to 2000, he was deputy to former Secretary of Defense William J. Perry in the North Korea Policy Review and traveled with him to Pyongyang. In 2001-2002, he served on the National Academy of Sciences Committee on Science and Technology for Countering Terrorism and advised on the creation of the Department of Homeland Security. In 2003 he was a member of the National Security Advisory Group to the U.S. Senate Democratic Leadership, with William Perry, Gen. Wesley K. Clark, Madeleine Albright, and others.

In addition to his public service, Dr. Carter is currently a Senior Partner of Global Technology Partners, Chairman of the Advisory Board of MIT's Lincoln Laboratories, a member of the Draper Laboratory Corporation, and a member of the Board of Directors of Mitretek Systems. He is a consultant to Goldman, Sachs and the MITRE Corporation on international affairs and technology matters, and speaks frequently to business and policy audiences. Dr. Carter is also a member of the Aspen Strategy Group, the Council on Foreign Relations, the American Physical Society, the International Institute of Strategic Studies, and the National Committee on U.S.-China Relations. Dr. Carter was elected a Fellow of the American Academy of Arts and Sciences.

Carter's research focuses on the Preventive Defense Project, which designs and promotes security policies aimed at preventing the emergence of major new threats to the United States. Carter and former Secretary of Defense William J. Perry co-authored *Preventive Defense: A New Security Strategy for America*, which identified and prioritized the threats to U.S. national security in the 21st century.

Before his latest government service, Dr. Carter was Director of the Center for Science and International Affairs at Harvard University's John F. Kennedy School of Government, and Chairman of the Editorial Board of *International Security*. Previously, he has held positions at the Massachusetts Institute of Technology, the Congressional Office of Technology Assessment, and Rockefeller University.

Dr. Carter received bachelor's degrees in physics and in medieval history from Yale University, summa cum laude, Phi Beta Kappa. He received his doctorate in theoretical physics from Oxford University, where he was a Rhodes Scholar.

In addition to authoring numerous articles, scientific publications, government studies, and Congressional testimonies, Dr. Carter co-edited and co-authored eleven books, including Keeping the Edge: Managing Defense for the Future (2001), Preventive Defense (1997), Cooperative Denuclearization: From Pledges to Deeds (1993), A New Concept of Cooperative Security (1992), Beyond Spinoff: Military and Commercial Technologies in a Changing World (1992), Soviet Nuclear Fission: Control of the Nuclear Arsenal in a Disintegrating Soviet Union (1991), Managing Nuclear Operations (1987), Ballistic Missile Defense (1984), and Directed Energy Missile Defense in Space (1984).