A New Non-Proliferation Strategy

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Joseph Cirincione, Director for Non-Proliferation Carnegie Endowment for International Peace

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The rules that govern nuclear exports, safeguard nuclear materials, and control and eliminate nuclear weapons are not self-enforcing. States and international agencies must struggle to mobilize the power needed to enforce and adapt these rules as conditions change.

In 1995, in perhaps the single greatest strengthening of the regime since its founding, the signatories to the Non-Proliferation Treaty agreed to transform its original twenty-five year term into an open-ended commitment. In doing so, they committed themselves to a stringent bargain. One hundred and seventy-three states in that year reaffirmed their renunciation of nuclear weapons in return for the explicitly reaffirmed commitment by the United States, China, France, Russia, and the United Kingdom to eventually eliminate their nuclear arsenals. All states did so with the understanding that while the treaty was clearly imperfect, it nonetheless made them all safer—individually and collectively.

But the world has changed dramatically in the last ten years. We have seen terrorism, wars, nuclear black markets, and states cheating on, and even leaving, the NPT. Perhaps today's greatest threat stems from the wide availability of highly enriched uranium and plutonium, the fissile materials that are the fuel of nuclear bombs. These materials have

become more accessible to terrorists through the poor security at nuclear stockpiles in the former Soviet republics and in dozens of other countries.

There is also danger that new nations could acquire nuclear weapons by exploiting the NPT's failure to define specifically what constitutes the "peaceful" application of nuclear capabilities. As the treaty has been interpreted, countries can acquire technologies that bring them to the very brink of nuclear weapon capability without explicitly violating the agreement, and can then leave the treaty without penalty.

There are also newer concerns. Fifteen years after the end of the Cold War, the majority of countries feel that the five original nuclear weapon states do not intend to fulfill their end of the NPT bargain—the pledge to eliminate nuclear weapons. That growing conviction erodes the willingness among members of this majority to live up to their side of the bargain—much less to agree to strengthen the regime.

For all these reasons and more, there are rising doubts about the sustainability of the nonproliferation regime. Nations with ample technological ability to develop nuclear weapons may be reconsidering their political decisions not to do so.

All of these developments show that in spite of major successes much more needs to be done to reduce the possibility of nuclear catastrophe. All nations—including the three unwilling to sign the Non-Proliferation Treaty—need to be covered. Access to weapons material and the means of producing it needs to be far more tightly limited everywhere. Nonproliferation rules must be extended to individuals and corporations.

The Bush administration has correctly drawn international attention to the need for serious enforcement. For many years, too much attention had been paid to obtaining signatures on treaties, and not enough to achieving compliance with them. The absence of a collective political will to stop bad actors—by force if necessary—undermined deterrence. The United States itself had routinely made proliferation concerns secondary to other strategic and economic issues in relations with key states such as Pakistan, Israel, and Iraq.

However, the current Bush strategy—like the one it replaced—has proven insufficient. Stopping the spread of nuclear weapons requires more international resolve than previous administrations could muster, but it also demands more genuine international teamwork than the Bush administration recognizes. Nuclear weapons and fissile materials are problems wherever they are, not just in a handful of "evil" states. The threat cannot be eliminated by removing whichever foreign governments the United States finds most threatening at any given time. History has shown again and again that today's ally can become tomorrow's problem state. Moreover, terrorists will seek nuclear weapons and materials wherever they can be found, irrespective of a state's geopolitical orientation.

The United States cannot defeat the nuclear threat alone, or even with small coalitions of the willing. It needs sustained cooperation from dozens of diverse nations—including the leading states that have forsworn nuclear weapons, such as Argentina, Brazil, Germany, Japan, South Africa, and Sweden—in order to broaden, toughen, and stringently enforce

nonproliferation rules. To get that cooperation, the nuclear weapon states must show that tougher nonproliferation rules not only benefit the powerful but constrain them as well.

Success will depend on the United States' ability to marshal legitimate authority that motivates others to follow. As Francis Fukuyama notes, "Other people will follow the American lead if they believe it is legitimate; if they do not, they will resist, complain, obstruct, or actively oppose what we do."

Recent events, most dramatically the war in Iraq, have undermined America's legitimacy. With societies bristling at U.S. government rhetoric and action, elected leaders in key countries distance themselves from U.S. initiatives.

Even when others share U.S. views of the nuclear threat, they may balk at following U.S. policies because they do not see Washington acting on *their* priorities, for example, the Comprehensive Test Ban Treaty.

In Robert Kagan's words, "The United States can neither appear to be acting only in its self-interest, nor can it, in fact, act as if its own national interest were all that mattered." As Prime Minister Tony Blair said in January, "If America wants the rest of the world to be part of the agenda it has set, it must be part of their agenda too."

The new proliferation challenges make it clear beyond denial that the present nonproliferation regime needs fixing. This is a time that demands systemic change: a new strategy to defeat old and new threats before they become catastrophes.

A Global Nuclear Threat Assessment

Nuclear threats lie along four axes, though development along one axis often influences developments along the others. The four categories of threat are nuclear terrorism, new nuclear weapon states and regional conflict, existing nuclear arsenals, and regime collapse. The greatest concerns are outlined here.

I. Nuclear Terrorism: The Most Serious

While *states* can be deterred from using nuclear weapons by fear of retaliation, *terrorists*, who have neither land, people, nor national futures to protect, may not be deterrable. Terrorist acquisition of nuclear weapons therefore poses the greatest single nuclear threat. The gravest danger arises from terrorists' access to state stockpiles of nuclear weapons and fissile materials, because acquiring a supply of fissile material (as opposed to making the weapon itself) remains the most difficult challenge for a terrorist group. So-called outlaw states are not the most likely source. Their stockpiles, if any, are small and exceedingly precious, and hence well guarded. (Nor are these states likely to give away what they see as the crown jewels in their security crowns.) Rather, the most likely sources of nuclear weapons and materials for terrorists are storage areas in the former states of the Soviet Union and in Pakistan, and fissile material kept at dozens of civilian sites around the world.

Russia and other former Soviet states possess thousands of nuclear weapons and hundreds of tons of inadequately secured nuclear material. Terrorist organizations and radical fundamentalist groups operate within Pakistan's borders. National instability or a radical change in government could lead to the collapse of state control over nuclear weapons and materials and to the migration of nuclear scientists to the service of other nations or groups.

There is also a substantial risk of terrorist theft from the nuclear stockpiles in more than forty countries around the world. Many of these caches of materials consist of highly enriched uranium that could be directly used in nuclear weapons, or further enriched to weapons grade. There are also significant stockpiles of plutonium that can be used in a weapon, though with more difficulty.

II. New Nuclear Nations and Regional Conflicts

The danger posed by the acquisition of nuclear weapons by Iran or North Korea is not that either country would likely use these weapons to attack the United States, the nations of Europe, or other countries. Iran, for example, would likely decide to build nuclear weapons only as a means to defend itself from the aggression of other nations. Iranian leaders, like the leaders of other states, would be deterred from using nuclear weapons in a first strike by the certainty of swift and massive retaliation.

But what Iran sees as a defensive move would trigger dangerous reactions from other states in the region. A nuclear reaction chain could ripple through a region and across the globe, triggering weapon decisions in several, perhaps many, other states. Such developments could weaken Iran's security, not increase it. With these rapid developments and the collapse of existing norms could come increased regional tensions, possibly leading to regional wars and to nuclear catastrophe. iii

Existing regional nuclear tensions already pose serious risks. The decades-long conflict between India and Pakistan has made South Asia for many years the region most likely to witness the first use of nuclear weapons since World War II. There is an active missile race underway between the two nations, even as India and China continue their rivalry. In Northeast Asia, North Korea's nuclear capabilities remain shrouded in uncertainty but presumably continue to advance. Miscalculation or misunderstanding could bring nuclear war to the Korean peninsula.

In the Middle East, Iran's declared peaceful nuclear energy program, together with Israel's nuclear arsenal and the chemical weapons of other Middle Eastern states, adds grave volatility to an already conflict-prone region. If Iran were to decide at some later date to build nuclear weapons, Egypt, Saudi Arabia, or others might initiate or revive nuclear weapon programs. It is possible that the Middle East could go from a region with one nuclear weapon state, to one with two, three, or five such states within a decade—with existing political and territorial disputes still unresolved. iv

III. The Risk from Existing Arsenals

There are grave dangers inherent in the maintenance of thousands of nuclear weapons by the United States and Russia and the hundreds of weapons held by China, France, the United Kingdom, Israel, India, and Pakistan. While each state regards its nuclear weapons as safe, secure, and essential to its security, each views others' arsenals with suspicion.

Though the Cold War has been over for more than a dozen years, Washington and Moscow maintain thousands of warheads on hair-trigger alert, ready to launch within fifteen minutes. This greatly increases the risk of an unauthorized launch. Because there is no time buffer built into each state's decision-making process, this extreme level of readiness also enhances the possibility that either side's president could prematurely order a nuclear strike based on flawed intelligence.

Recent advocacy by some in the United States of new battlefield uses for nuclear weapons could lead to new nuclear tests. The five nuclear weapon states recognized by the Non-Proliferation Treaty have not tested since the signing of the Comprehensive Test Ban Treaty in 1996, and no state has tested since India and Pakistan did in May 1998. New U.S. tests would trigger tests by other nations, collapsing the CTBT, which is widely regarded as a pillar of the nonproliferation regime.

To the extent that the leaders of a given state are contemplating acceding to U.S. or international nonproliferation demands, these leaders may feel a strong need for equity so that they can show their publics that giving up nuclear aspirations is fair and in their interest. It is difficult, if not impossible, to demonstrate either when immensely powerful nuclear weapon states reassert the importance of nuclear weapons to their own security.

IV. The Risk of Regime Collapse

If U.S. and Russian nuclear arsenals remain at Cold War levels, many nations will conclude that the weapon states' promise to reduce and eventually eliminate these arsenals has been broken. Non-nuclear states may therefore feel released from their pledge not to acquire nuclear arms.

The Non-Proliferation Treaty is already severely threatened by the development in several states of facilities for the enrichment of uranium and the reprocessing of plutonium. Although each state asserts that these are for civilian use only, supplies of these materials potentially puts each of these countries "a screwdriver's turn" away from weapons capability. This greatly erodes the confidence that states can have in a neighbor's non-nuclear pledge.

Additionally, there appears to be growing acceptance of the nuclear status of Pakistan and India, with each country accruing prestige and increased attention from leading nuclear weapon states, including the United States. Some now argue that a nuclear Iran or North Korea could also be absorbed into the international system without serious consequence.

If the number of states with nuclear weapons increases, the original nuclear weapon states fail to comply with their disarmament obligations, and states such as India gain status for

having nuclear weapons, it is possible that Japan, Brazil, and other major non-nuclear nations will reconsider their nuclear choices. Most nations would continue to eschew nuclear weapons, if only for technological and economic reasons, but others would decide that nuclear weapons were necessary to improving their security or status. There is a real possibility, under these conditions, of a system-wide collapse.

What We Must Do

Global nuclear security requires *universal compliance* with the norms and rules of a *toughened* nuclear nonproliferation regime. *Compliance* means more than signatures on treaties, or declarations of good intent – it means actual performance. *Universal* means that nonproliferation norms and rules must be extended not only to states that have joined the treaties, but to all states, and to nonstate actors as well.

The Carnegie study conceptualizes the changes needed as six obligations. Below is a summary of these obligations and twenty of the key policy recommendations that flow from them. In all, there are over one hundred specific policy recommendations in the Carnegie report.

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OBLIGATION ONE: Make Nonproliferation Irreversible.

We must revise the rules managing the production of nuclear weapon-usable materials, and clarify and tighten the terms by which states can withdraw from the NPT.

Specifically, this means we should

- 1. Preclude the acquisition of uranium enrichment and plutonium reprocessing plants by any additional state.
- 2. Provide states internationally guaranteed, economically attractive supplies of the fuel and services necessary to meet nuclear energy demands.
- 3. End the production of highly enriched uranium and adopt a temporary "pause" in the separation of plutonium.
- 4. Pass a new UN Security Council resolution making a state that withdraws from the NPT responsible for violations committed while it was still a party to the treaty.
- 5. Bar states that withdraw from the treaty from legally using nuclear assets acquired internationally before their withdrawal; and,
- 6. Suspend nuclear cooperation with countries that the IAEA cannot certify are in full compliance with their nuclear nonproliferation obligations.

OBLIGATION TWO: Devalue the Political and Military Currency of Nuclear Weapons.

All states must diminish the role of nuclear weapons in security policies and international politics. The nuclear weapon states must do more to make their nonproliferation commitments irreversible, especially through the steady verified dismantlement of nuclear arsenals.

Specifically, this means we should:

- Disavow the development of new types of nuclear weapons, reaffirm the current moratorium on nuclear weapon testing, and ratify the Comprehensive Test Ban Treaty.
- 8. Lengthen the time decision makers would have before deciding to launch nuclear weapons; and
- 9. Make nuclear weapon reductions, such as those required under the 2002 Treaty of Moscow, irreversible and verifiable.

OBLIGATION THREE: Secure All Nuclear Materials.

All states must maintain robust standards for securing, monitoring, and accounting for all fissile materials in any form.

Acquiring nuclear materials—whether by making, buying, or stealing them—is the single most difficult step for terrorists, as it is for states seeking nuclear weapons. Therefore, the security of nuclear stockpiles—wherever they are—is as vital an element of defense as any weapons system. Specifically, we recommend:

- 10. The formation of a high-level "Contact Group to Prevent Nuclear Terrorism" to establish a new global standard for protecting weapons, materials, and facilities.
- 11. The United States, Russia, and their partners should vigorously identify, secure, and remove nuclear materials from all vulnerable sites within four years—an accelerated "Global Cleanout."

OBLIGATION FOUR: Stop Illegal Transfers.

States must establish enforceable prohibitions against efforts by individuals, corporations, and states to assist others in secretly acquiring the technology, material, and know-how needed to develop nuclear weapons.

Nonproliferation norms and rules must be universal—applying equally to nonstate actors and to all states. The Security Council took a vital step in this direction by passing Resolution 1540 in April 2004. To develop this promising beginning:

- 12. All states should now establish and enforce national legislation to secure nuclear materials, strengthen export controls, and criminalize illicit trade, as this resolution requires.
- 13. The IAEA's Additional Protocol should be mandatory for all states, and the members of the Nuclear Suppliers Group should make it a condition of supply to all their transfers
- 14. Members of the Nuclear Suppliers Group should expand their voluntary data sharing with the IAEA and make it obligatory for transfer of all controlled items.
- 15. Corporations should back up these policies with voluntary actions to block trade, loan, and investment activity with those illegally seeking nuclear capabilities.
- 16. The Proliferation Security Initiative should be grounded in international law and widened to cover international waterways and airspace.

OBLIGATION FIVE: Commit to Conflict Resolution.

States that possess nuclear weapons must use their leadership to resolve regional conflicts that compel or excuse some states' pursuit of security by means of nuclear, biological, or chemical weapons.

17. The major powers must concentrate their diplomatic influence on diffusing the conflicts that underlie these and possibly other nations' determination to possess nuclear weapons.

OBLIGATION SIX: Solve the Three-State Problem.

The unrealistic demand that India, Israel, and Pakistan give up their weapons and join the NPT as non-nuclear states should be replaced by a policy that persuaded these three states to accept the same nonproliferation obligations accepted by the weapon state signatories.

- 18. Drop the demand that India, Israel, and Pakistan give up their nuclear weapons absent durable peace in their respective regions and progress toward global disarmament.
- 19. Persuading the three states to accept all of the nonproliferation obligations accepted by the five original nuclear weapon states, which they are not now committed to do.

20. The three states should not be rewarded with trade in nuclear power reactors, but should receive cooperation to strengthen nuclear material security and reactor safety.

There is much more detail and exposition in the Carnegie report. The reports' basic conclusion is one upon which all the authors agree: Only by forging this balance of obligations involving all states and all actors can we erect a defense in depth to the dangers from the spread of nuclear weapons.

¹ Francis Fukuyama, "The Neoconservative Moment," *The National Interest*, June 1, 2004.

ii Robert Kagan. *Of Paradise and Power: America and Europe in the New World Order* (New York: Alfred A. Knopf, 2003), afterword, p. 154.

iii This is the danger President Kennedy warned of in 1963. "I ask you to stop and think for a moment what it would mean to have nuclear weapons in so many hands, in the hands of countries large and small, stable and unstable, responsible and irresponsible, scattered throughout the world," he said. "There would be no rest for anyone then, no stability, no real security, and no chance of effective disarmament. There would only be the increased chance of accidental war, and an increased necessity for the great powers to involve themselves in what otherwise would be local conflicts." John F. Kennedy, "Radio and Television Address to the American People on the Nuclear Test Ban Treaty," July 26, 1963, available at http://www.jfklibrary.org/jfk test ban speech.html (accessed December 10, 2004).

iv Several countries in the Middle East are capable of pursuing nuclear weapon programs or otherwise acquiring nuclear weapons, including Saudi Arabia, Egypt, and Turkey. Saudi Arabia might seek to purchase nuclear weapons from Pakistan, or invite Pakistan to station nuclear weapons on its territory. Other countries have at least the basic facilities and capabilities to mount a nuclear weapon program, albeit not without significant political and economic consequences. Egypt and Turkey could probably acquire enough nuclear material to produce a nuclear weapon within a decade of launching such an effort.

^v Former U.S. Senator Sam Nunn argues, "The more time the United States and Russia build into our process for ordering a nuclear strike the more time is available to gather data, to exchange information, to gain perspective, to discover an error, to avoid an accidental or unauthorized launch." Speech to the Carnegie International Non-Proliferation Conference, June 21, 2004, available at www.ProliferationNews.org.