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# The NPT Hold-Out States and the Nonproliferation Regime: Fixing the Flaws in the U.S.-Indian Nuclear Cooperation Proposal

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Six decades after the first atomic blasts, the world's leaders agree that nuclear weapons pose one of the greatest threats to global security and human existence. However, there is a growing divide about the nature of the dangers and how to address them. The lack of consensus not only makes it harder to reach agreement on new measures and diplomatic initiatives to necessary to strengthen compliance and implementation with the nuclear Nonproliferation Treaty (NPT) by its 188 member states, but is also making it more difficult to hold the three NPT outliers–India, Israel, and Pakistan–to the same nonproliferation and disarmament standards expected of other responsible states.<sup>1</sup>

For some states the danger is one of "dangerous weapons in the hands of dangerous regimes." Leaders in these states have a difficult time seeing the connection between the possession and further development of nuclear weapons by the five original nuclear-weapon states, as well as the three NPT hold out states that possess nuclear weapons, and the acquisition of nuclear weapons-technology and fissile material by other states.

For the world's most influential state—the United States—Israel, India, and Pakistan are not seen as antagonistic to U.S. interests, and therefore the current leadership in Washington does not consider their nuclear stockpiles a threat. Washington's efforts to urge these states to live up to certain international nonproliferation and disarmament norms and practices are often compromised by other competing bilateral interests in these states.

Others see the nuclear proliferation threat as one of "dangerous weapons that threaten peace and stability everywhere." So long as some states possess nuclear weapons, it will be far more difficult to convince other states to foreclose the option. The issue is further complicated by the fact that nuclear technology is widely perceived to be the hallmark of an advanced, technologically developed state and a means to achieve energy independence. So long as nuclear technology with direct weapons applications (particularly plutonium separation and uranium enrichment technology) are considered necessary for peaceful pursuits, our ability to cap the size of the nuclear weapons club will suffer.

For example, for the same reason that states in the Middle East are concerned about the future course and capabilities of Iran's nuclear program, it is not clear that Iran can be convinced or coerced into giving up the nuclear weapons option unless its legitimate nuclear energy ambitions are respected and other nuclear-armed states do not pose a threat to Iran. The transfer of weapons-relevant nuclear items and expertise from Pakistan to North Korea, Iran, and other states has helped create a new wave of proliferation and risk that the international community is still trying—so far unsuccessfully—to manage. The unchecked growth and development of India and Pakistan's fissile material stockpiles and ballistic missile programs and their refusal to join a legally-binding test moratorium not only perpetuate the two states' military competition and the risk of a future nuclear conflict, but it complicates efforts to urge China to exercise greater restraint with respect to its nuclear and missile arsenals.

A more comprehensive and practical strategy to uphold and strengthen the standards and norms against the spread, possession, development, testing, and use of nuclear weapons is long overdue. Though it is highly unlikely that Israel, India, or Pakistan will renounce their nuclear arsenals any time soon and join the NPT as a non-nuclear-weapon state, these countries still need to be more fully and meaningfully engaged in the nonproliferation regime across the full spectrum of nonproliferation and disarmament standards and obligations. (See the appended "Nuclear Nonproliferation Standards and Practices Matrix" for further detail.) Every state that professes support for nonproliferation and disarmament has an important role to play in consistently applying this approach.

The international community is fast approaching a key crossroads regarding its approach to the three NPT hold-outs. Within a few months, the 45-member states of Nuclear Suppliers Group will be asked to decide upon a U.S.-sponsored proposal to make an exception to its guidelines that prohibits nuclear commerce with states, such as India, that do not accept full-scope International Atomic Energy Agency (IAEA) safeguards.

The outcome of the debate will have a profound influence on whether India and Pakistan can be persuaded to exercise greater restraint with respect to fissile material production, formalize its test ban, tighten its export control and procurement practices, and maintain its arsenal at a lower state of readiness.

When the member states of the NPT meet for the next Preparatory Committee Conference in 2007, the U.S.-Indian proposal will likely complicate the already difficult task of reaching consensus on a comprehensive package of measures that would strengthen the treaty and encourage Iran and North Korea to comply with their safeguards and treaty obligations. Recall that the 1995 NPT Review and Extension Conference endorsed full-scope safeguards as a standard for civil nuclear supply.

If adopted in its present form, the U.S.-Indian proposal may also encourage other states to seek similar exceptions to nonproliferation barriers for their preferred economic and political partners. China is the most likely state to seek a similar nuclear bargain for Pakistan. The U.S.-Indian proposal has already prompted Russia to reverse it previous policy and decide to sell India nuclear fuel in violation of current Nuclear Suppliers Group (NSG) rules. Simply put, the proposal could erode the already battered NPT system.

#### The U.S.-Indian Nuclear Deal in Perspective

For the better part of four decades, India has chosen to remain outside the nuclear nonproliferation mainstream. While advocating the general goal of nuclear disarmament, Indian leaders have shunned the NPT since its inception in 1968. Six years after this treaty's negotiation, India deliberately and inappropriately used U.S. and Canadian nuclear imports designated for peaceful purposes to explode a nuclear device. Since that test, India surreptitiously built up a nuclear weapons stockpile, refused to subject all but a handful of its nuclear facilities to outside inspection, and defiantly conducted a series of nuclear tests in May 1998 just two years after the international community concluded the Comprehensive Test Ban Treaty (CTBT). With help from China and years of willful neglect by the United States, Pakistan has followed a similar path.

Over the years, the international community, led by the United States, has pursued policies and standards designed to deny India and Pakistan access to nuclear weapons-related technology and encourage them to restrain the growth and development of their nuclear arsenals:

- The U.S. passed the Nuclear Nonproliferation Act of 1978, which restricts nuclear commerce with states that do not agree to full-scope safeguards;
- The NSG was formed in the 1975 to help prevent the misuse of technology acquired under peaceful auspices;
- The NSG adopted the full-scope safeguards standard in 1992;
- The UN Security Council adopted in 1998 Resolution 1172, which calls upon India and Pakistan to immediately stop their weapon development programs, halt fissile material production for weapons purposes, and to sign the CTBT, among other nonproliferation measures.
- China joined the NSG in 2004, which has limited its support for Pakistan's nuclear program.

Though the U.S. and international effort has sometimes been significant, it has been inconsistent. Still, these policies have helped limit the capabilities of the Indian and Pakistani nuclear weapons programs.

The July 18, 2005 U.S.-Indian proposal to provide "full" civilian nuclear assistance represents an abandonment of the traditional approach. Supporters of the proposal for civil nuclear cooperation with India claim that it is time to acknowledge that India will not abandon its nuclear arsenal. They assert that the nuclear cooperation arrangement will help India significantly expand energy production<sup>2</sup> and that India's acceptance of IAEA safeguards on an additional eight nuclear reactors by 2014 is a major nonproliferation gain that would "help bring India into the nuclear nonproliferation mainstream."

IAEA Director-General Mohamed ElBaradei claimed in a June 14 opinion editorial that the deal "does not add to or detract from India's nuclear weapons program, nor does it confer any 'status,' legal or otherwise, on India as a possessor of nuclear weapons."

#### Realities

The claims of the proponents of the proposal are seriously misleading or simply wrong. Indeed, the deal would secure no meaningful constraint on the growth or development of India's nuclear weapons stockpile nor would it require India to accept the equivalent of the nonproliferation obligations of Articles I and VI of the NPT. The deal, if implemented, would effectively grant India highly sought-after access to nuclear technology and fuel only accorded to states in full compliance with global nonproliferation standards. It would also treat India in much the same way as the five original nuclear-weapon states by exempting it from meaningful international nuclear inspections. It is a virtual endorsement of India's nuclear weapons status.

The value of safeguards on a handful of additional nuclear facilities in a country with a substantial unsafeguarded military nuclear program is far more symbol than substance. As the Deputy Director of the U.S. Arms Control Disarmament Agency Adrian Fisher said to the ENDC on July 28, 1966:

"A strict inspection of the peaceful nuclear activities of existing nuclear-weapon Powers when there is no restriction on their increasing their large nuclear stockpiles might well be described as straining at gnats while swallowing camels. It flies in the face of logic to argue that such a solution is essential to the objectives of nonproliferation. That type of inspection would become relevant when we have followed a nonproliferation treaty with other measures which would prevent the nuclear-weapon powers from increasing their stockpiles"

However limited the value of such safeguards, they would add a costly new burden on the already stretched resources of IAEA.

Worse still, the supply of foreign nuclear fuel would free up India's relatively limited domestic uranium supply to be devoted exclusively to increasing the rate of fissile production for nuclear weapons.

The arrangement does not bring India into the nonproliferation mainstream. Instead, it weakens the nonproliferation and disarmament standards that have been championed for decades.

# **Fixing the Deal**

The draft legislation approved by the House International Relations Committee and the Senate Foreign Relations Committee in June closes several loopholes in the administration's original proposal. But there remain several fundamental shortcomings that can and should be addressed.

Later this year, the House and Senate will reconcile the differences between their respective versions of the U.S. legislation that opens the way for U.S. civil nuclear exports to India. Negotiations between the United States and Indian governments on a detailed agreement for nuclear cooperation must be hammered out and approved by Congress. India and the IAEA must conclude negotiations on safeguards for additional Indian nuclear facilities.

The leaders of other states who are concerned about the U.S.-Indian proposal will also have their opportunity to weigh-in. Among the provisions added by Congress is a requirement that the president must win consensus approval from the NSG for renewed civil nuclear trade with India.

When NSG members engage in that debate, they will have a responsibility to insist on a better alternative. Five issues that merit the special attention of NSG member states:

## 1. Fissile Material Production and Indirect Assistance to Weapons Production

The proposed U.S.-Indian nuclear cooperation arrangement is premised on the idea that India is prepared to "assume the same responsibilities and practices" as other nuclear-weapon states. Unfortunately, the existing terms of the proposal would not oblige New Delhi to undertake the same practices as the five original nuclear-weapon states, including signature of the CTBT and actively work toward an "early cessation of the nuclear arms race" and disarmament, as Article VI of the NPT requires of its states-parties.

However, the most significant shortcoming of the proposal is its failure to win any meaningful commitment from India to curtail production of fissile material (i.e. plutonium and highly enriched uranium) for weapons purposes.

Four of the five original nuclear-weapon states—France, Russia, the United Kingdom, and the United States—have all publicly and unilaterally declared a halt to fissile material production for weapons. China is also believed to have stopped fissile material production for weapons in order to focus on the production of nuclear fuel for energy purposes.

Absent an Indian commitment to halt its fissile material production, the supply of foreign nuclear fuel to India would also free-up India's existing and somewhat limited capacity to produce plutonium

and highly enriched uranium for weapons. This could allow for the rapid expansion of India's nuclear arsenal from the current annual rate of some 6-10 bombs to several dozen if India chooses to do so.

While the administration claims it has no intention to aid India's bomb program, the issue is not one of just intent. It is also a legal matter. Article I of the NPT obligates the recognized nuclear-weapon powers, including the United States, to "not in any way to assist, encourage, or induce any non-nuclear weapon State to manufacture or otherwise acquire nuclear weapons or other nuclear explosive devices, or control over such weapons or explosive devices."

Some proponents of the nuclear deal in the United States claim that India has large reserves of uranium already and that India's nuclear bomb program is not now constrained by its domestic uranium stockpile.<sup>3</sup> They claim that U.S. and other foreign nuclear fuel supplies would not facilitate increased bomb material production by India and would only help relieve India's shortage of nuclear fuel for nuclear energy production. Not true.

There is no debate that India has "uranium reserves." The fact is that India has been unable to exploit these reserves to the extent that advocates for the nuclear deal have claimed. As a result, India would be hard pressed to maintain, let alone increase, the rate of production of fissile material for weapons while expanding its nuclear energy output, unless it can significantly expand domestic uranium mining and milling, and/or get access to the international nuclear fuel market.

India currently produces about 300 tons of uranium annually, which is almost two-thirds of what is needed to run its current heavy-water power reactors, support its production of highly enriched uranium for its nuclear submarine program and its current weapons grade plutonium production rate. It has had to rely on stocks of previously mined and processed uranium to meet the shortfall. The addition of new energy production reactors in the near future will increase the total demand for uranium beyond projected increases in domestic uranium production.

This is why K Subrahmanyam, the former head of India's National Security Advisory Board, wrote that: "Given India's uranium ore crunch and the need to build up our minimum credible nuclear deterrent arsenal as fast as possible, it is to India's advantage to categorize as many power reactors as possible as civilian ones to be refueled by imported uranium and conserve our native uranium fuel for weapons grade plutonium production."<sup>4</sup>

There are several scenarios that could allow India to utilize foreign nuclear fuel supplies to help it increase fissile material production for weapons purposes. For instance, if India builds a new plutonium-production reactor (as it is reportedly planning to do) or decides to use one or more of the eight existing heavy water reactors that would be excluded from IAEA safeguards to augment its two existing military plutonium production reactors (CIRUS and Dhruva), the additional increased consumption of domestic uranium supplies for plutonium production would be compensated for by access to imported uranium for safeguarded power reactors.

And, if India no longer needs to rely on domestic uranium to fuel its power reactors, it could also expand its small-scale centrifuge enrichment program to make highly enriched uranium for nuclear weapons purposes.

Moreover, as Indian officials have noted, the military and civilian nuclear programs are closely

intertwined. The proposed separation plan does not provide safeguards against the transfer of personnel between India's civil and military nuclear programs, nor does the arrangement prevent the possible replication of advanced nuclear technology acquired under peaceful auspices for military applications. The U.S. Senate has proposed an "end-use monitoring program to improve confidence that U.S.-origin transfers are used only for peaceful purposes, but that program would not cover nuclear transfers to India by other NSG states.

The strongest guarantee that expanded civil nuclear trade with India would not contribute to its nuclear weapons program or stimulate further arms competition in Asia would be to for the Nuclear Suppliers Group to defer a decision on necessary changes to its guidelines until such time as India, as a matter of public policy, is no longer producing fissile material for nuclear weapons purposes, or has entered into a multilateral arrangement to stop fissile material production for weapons purposes, or has joined a global verifiable fissile material production cutoff treaty.

The July 18 Joint Statement affirms India's support for the negotiation of a global fissile material cutoff treaty (FMCT). This is a positive statement but it is not a new pledge.

India has for several years stated its support for the negotiation of a global, verifiable FMCT, but negotiations toward such a treaty have been deadlocked since the late 1990s due to differences over negotiating priorities. The current impasse is primarily the result of U.S. opposition to the negotiation of a verifiable treaty and to discussions on other arms control topics at the 65-nation Conference on Disarmament. Ironically, India has stated that it would only support a verifiable FMCT.

Indian officials, who are concerned about China's slow-moving nuclear modernization plan, have resisted suggestions that they unilaterally halt fissile material production for weapons purposes. Critics of the nuclear cooperation deal within India who resist constraints on India strategic modernization program have gone further and criticized any pledge by New Delhi to support FMCT negotiations.

In response, the State Department continues to "call upon both [Pakistan and China] to also agree, as India has, to work toward a Fissile Material Cutoff Treaty" and says that "we stand ready to explore interim objectives." That's laudable too, but what does that mean? Until such time as the U.S. government adjusts its position and negotiators resolve differences over verification and other issues or else decides to pursue a multilateral agreement to halt fissile material production by the eight known nuclear-weapon states, the realization of the FMCT will remain a distant goal and India's FMCT pledge will remain an empty gesture.

# 2. Nuclear Testing Limitations.

The July 18 Joint Statement also reiterates India's commitment to maintain its moratorium on nuclear test explosions—a political pledge that it has made before in other contexts. All of the other original nuclear-weapon states are not only observing unilateral moratoria, but they have also signed the CTBT, which according to customary reading of Article XVIII of the Vienna Convention on Treaties, establishes a legally-binding commitment not to take any action "contrary to the purpose or intent" of the treaty prior to ratification, which in the case of the CTBT is to ban nuclear test explosions of any kind.

While India has resisted joining the CTBT to date, it has stated that it will not be the last state to hold up its entry into force. It is also conceivable that India might join with Pakistan in a treaty pledging that neither will be the first to conduct a nuclear test explosion. To encourage India to actually assume the same responsibilities and practices expected of other nuclear-weapon states, NSG member states should require— as a condition for exempting India from the full-scope safeguards standard—that New Delhi makes a legally-binding commitment not to conduct nuclear weapon test explosions or nuclear explosions of any kind.

# 3. Safeguards and "Assured Fuel Supplies."

India has agreed to allow permanent IAEA safeguards on nuclear reactors and facilities that it designates as "civilian." By the time the separation plan is to be implemented in 2014, as many as eight additional nuclear reactors would be safeguarded.<sup>5</sup>

In describing India's civil-military separation plan in a statement to the Indian Parliament on March 6, Prime Minister Singh also declared that India would pursue a safeguards agreement with the IAEA that is "India-specific." He also declared, "We have received commitments from the United States for the reliable supply of fuel to India for reactors that will be offered for safeguards. The United States has also reaffirmed its assurance to create the necessary conditions for India to have assured and full access to fuel for such reactors."

To date, a formal definition of "India-specific" IAEA safeguards has not been made public. In addition, the nature of the U.S. fuel-supply assurances is not clear, though this could most easily be achieved by helping India amass a fuel stockpile. While the congressional legislation stipulates that the safeguards over nuclear facilities declared by India as civilian should apply in perpetuity, it is not evident that India agrees that the safeguards will apply permanently if foreign nuclear fuel supplies for its civil reactors are interrupted, which would likely occur if India resumes nuclear testing or violates its safeguards or agreement for nuclear cooperation.

The NSG must clarify these ambiguities and refuse to endorse any arrangement that would allow India (or any other state) to make safeguards contingent upon a guaranteed fuel supply. To do so would invite states to acquire dual-use technology or stockpile nuclear fuel for later military use with minimal penalties.

## 4. An India-specific or country-neutral NSG guideline?

The United States has proposed that the NSG should make an "India-specific" exemption from its existing guideline requiring full-scope safeguards as a condition of supply. Other states, including China, would prefer a "country neutral" criteria for civil nuclear trade with states that never joined the NPT and do not accept full-scope IAEA safeguards, which would also include Israel and Pakistan.

In theory, a country-neutral approach would establish universal standards that apply to all states and provide a way for the three states that have never signed the NPT to more fully join the nonproliferation system and gain access to nuclear technology and fuel for peaceful purposes.

But there is also a possibility that the reaction by some states would be quite hostile to such a development because some states might perceive it as a first step toward extending legitimacy and nuclear benefits to Israel and Pakistan. To address this problem, the criteria set forth in a country-neutral approach could be made more stringent than those outlined by the United States and India. In

addition, the NSG should clearly delineate what actions would automatically trigger the termination of civil nuclear cooperation.

#### 5. Restrictions on Nuclear Trade

The Senate version of the enabling legislation for the U.S.-Indian nuclear deal contains an important restriction on the transfer of enrichment or reprocessing equipment or technology, which can be used to make nuclear bomb material. Indian critics and supporters of the proposal have complained bitterly about this provision.

However, as President Bush wisely noted in a speech in February 2004, "enrichment and reprocessing are not necessary for nations seeking to harness nuclear energy for peaceful purposes." If India is to have access to the international nuclear fuel market, access to more advanced U.S. or foreign enrichment and reprocessing technology not necessary. If NSG member states agree by consensus to change their guidelines to accommodate civil nuclear trade with India, they should adopt a similar prohibition. Such a policy should be noncontroversial since India has not agreed to place all of its reprocessing and enrichment facilities under permanent IAEA safeguards. To do otherwise would undermine efforts to limit the spread of reprocessing and enrichment technology around the world and possibly help India improve the productivity of its military fissile production capabilities.

#### **Conclusion**

The Bush-Singh proposal to make a special exception to the nonproliferation rules and standards for India has the potential to undermine the NSG and the nonproliferation system. India—and Israel and Pakistan—should have the option to expand nuclear energy production if they so choose. But their access to outside assistance should continue to depend upon their willingness to meet the same standards and practices expected of the world's other nations and should not jeopardize the solemn commitments of NPT states-parties not to provide assistance or encouragement to another state's nuclear weapons program.

For NSG states concerned about the fragility of the nonproliferation system and the adverse impact of the India nuclear deal, this is the time for them to stand up in defense of their security interests and the future of the nuclear nonproliferation system.

#### **Notes**

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<sup>&</sup>lt;sup>1</sup> This paper does not address the problem of North Korea, which joined the NPT but later announced its withdrawal. <sup>2</sup> For a critical assessment of this claim, see: "Wrong Ends, Means, and Needs: Behind the U.S. Nuclear Deal with India," by Zia Mian and M.V. Ramana, *Arms Control Today*, January/February 2006; "Power Points: the U.S.-India Nuclear Agreement is the wrong deal with the wrong energy source," by Leonard Weiss, *Bulletin of the Atomic Scientists*, May/June 2006; and "U.S. deal is a bad choice for power generation," by Brahma Chellaney, *The International Herald Tribune*, December 28, 2005.

<sup>&</sup>lt;sup>3</sup> See the June 2006 report, "Atoms for War?: U.S.-Indian Civilian Nuclear Cooperation and India's Nuclear Arsenal," by Ashley J. Tellis of the Carnegie Endowment for International Peace and former consultant to the State Department on the U.S. Indian nuclear cooperation proposal.

<sup>&</sup>lt;sup>4</sup> "India and the Nuclear Deal," by K Subrahmanyam, *Times of India*, December 12, 2005.

<sup>&</sup>lt;sup>5</sup> Currently four Indian reactors are under facility-specific INFCIRC/66.Rev.2 IAEA safeguards and India already agreed that two Russian-supplied light-water energy production reactors now under construction will also be safeguarded.