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PROPOSED AGREEMENT BETWEEN THE UNITED STATES OF AMERICA AND THE RUSSIAN FEDERATION CONCERNING PEACEFUL USES OF NUCLEAR ENERGY

MESSAGE

FROM

THE PRESIDENT OF THE UNITED STATES

TRANSMITTING

A PROPOSED AGREEMENT BETWEEN THE GOVERNMENT OF THE UNITED STATES OF AMERICA AND THE GOVERNMENT OF THE RUSSIAN FEDERATION FOR COOPERATION IN THE FIELD OF PEACEFUL USES OF NUCLEAR ENERGY, PURSUANT TO 42 U.S.C. 2153(b), (d)

MAY 13, 2008.—Message and accompanying papers referred to the Committee on Foreign Affairs and ordered to be printed

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U.S. GOVERNMENT PRINTING OFFICE
69–011 WASHINGTON : 2008

To the Congress of the United States:

I am pleased to transmit to the Congress, pursuant to sections 123b. and 123d. of the Atomic Energy Act of 1954, as amended (42 U.S.C. 2153(b), (d)) (the "Act"), the text of a proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy. I am also pleased to transmit my written approval, authorization, and determination concerning the Agreement, and a Nuclear Proliferation Assessment Statement (NPAS) concerning the Agreement (in accordance with section 123 of the Act, as amended by title XII of the Foreign Affairs Reform and Restructuring Act of 1998 (Public Law 105–277), a classified annex to the NPAS, prepared by the Secretary of State in consultation with the Director of National Intelligence, summarizing relevant classified information, will be submitted to the Congress separately). The joint memorandum submitted to me by the Secretary of State and the Secretary of Energy and a letter from the Chairman of the Nuclear Regulatory Commission stating the views of the Commission are also enclosed.

The proposed Agreement has been negotiated in accordance with the Act and other applicable law. In my judgment, it meets all applicable statutory requirements and will advance the non-proliferation and other foreign policy interests of the United States.

The proposed Agreement provides a comprehensive framework for peaceful nuclear cooperation with Russia based on a mutual commitment to nuclear non-proliferation. It has a term of 30 years, and permits the transfer of technology, material, equipment (including reactors), and components for nuclear research and nuclear power production. It does not permit transfers of Restricted Data, and permits transfers of sensitive nuclear technology, sensitive nuclear facilities, and major critical components of such facilities by amendment to the Agreement. In the event of termination, key non-proliferation conditions and controls continue with respect to material and equipment subject to the Agreement.

The Russian Federation is a nuclear weapon state party to the Treaty on the Non-Proliferation of Nuclear Weapons. Like the United States, it has a "voluntary offer" safeguards agreement with the International Atomic Energy Agency (IAEA). That agreement gives the IAEA the right to apply safeguards on all source or special fissionable material at peaceful nuclear facilities on a Russia-provided list. The Russian Federation is also a party to the Convention on the Physical Protection of Nuclear Material, which establishes international standards of physical protection for the use, storage, and transport of nuclear material. It is also a member of the Nuclear Suppliers Group, whose non-legally binding Guidelines set forth standards for the responsible export of nuclear commodities for peaceful use. A more detailed discussion of Russia's domes-

tic civil nuclear program and its nuclear non-proliferation policies and practices, including its nuclear export policies and practices, is provided in the NPAS and in the classified annex to the NPAS submitted to the Congress separately.

I have considered the views and recommendations of the interested agencies in reviewing the proposed Agreement and have determined that its performance will promote, and will not constitute an unreasonable risk to, the common defense and security. Accordingly, I have approved the Agreement and authorized its execution and urge that the Congress give it favorable consideration.

This transmission shall constitute a submittal for purposes of both sections 123b. and 123d. of the Atomic Energy Act. My Administration is prepared to begin immediately the consultations with the Senate Foreign Relations Committee and House Foreign Affairs Committee as provided in section 123b. Upon completion of the 30-day continuous session period provided for in section 123b., the 60-day continuous session period provided for in section 123d. shall commence.

GEORGE W. BUSH.

THE WHITE HOUSE, *May 12, 2008.*

THE WHITE HOUSE

WASHINGTON

May 5, 2008

Presidential Determination
No. 2008-19

MEMORANDUM FOR THE SECRETARY OF STATE
THE SECRETARY OF ENERGY

SUBJECT: Proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy

I have considered the proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy, along with the views, recommendations, and statements of interested agencies.

I have determined that the performance of the Agreement will promote, and will not constitute an unreasonable risk to, the common defense and security. Pursuant to section 123 b. of the Atomic Energy Act of 1954, as amended (42 U.S.C. 2153(b)), I hereby approve the proposed Agreement and authorize the Secretary of State to arrange for its execution.

The Secretary of State is authorized to publish this determination in the *Federal Register*.

THE SECRETARY OF STATE
WASHINGTON

May 1, 2008

UNCLASSIFIED

MEMORANDUM FOR THE PRESIDENT

FROM: Condoleezza Rice
Secretary of State

Samuel Bodman
Secretary of Energy

SUBJECT: Proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy

At the July 2006 St. Petersburg Summit, you and President Putin agreed that the United States and Russia would enter into negotiations on a bilateral agreement for peaceful nuclear cooperation. U.S. and Russian negotiators have agreed to the attached proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy ("the Agreement"). In the U.S.-Russia Strategic Framework Declaration that you issued with President Putin on April 6 at the Sochi Summit, you jointly stated that the United States and Russia would sign the Agreement "in the near future" and would work to bring it into force.

The United States has agreements of this type with most countries with substantial civil nuclear programs, but not yet with Russia. Beginning in the mid-1990s, the United States had refrained from negotiations with Russia on such an agreement as a matter of policy because of Russia's nuclear, missile, and advanced conventional weapons cooperation with Iran, including the construction of the Bushehr reactor. Early in 2006, the Administration reassessed U.S. policy in the light of significant developments in the Russia-

Iran context and concluded that it would be in the U.S. interest to begin negotiations on an agreement for peaceful nuclear cooperation with Russia. We made clear to Russian officials, however, that progress in the negotiations, and signature of the agreement, would depend on the ability of the United States and Russia to continue to work together on Iran. We believe that the level and scope of such cooperation have been sufficient to justify taking the remaining steps to conclude the Agreement.

If you authorize execution of the Agreement, it will be signed by representatives of the United States and Russia. Afterward, in accordance with sections 123 b. and d. of the Atomic Energy Act of 1954, as amended ("the Act"), it will be submitted to both Houses of Congress for review. (The letter of transmittal to the Congress will be held until after the Agreement is signed.) The Agreement must lie before Congress for 90 days of continuous session. Unless a joint resolution of disapproval is enacted, the Agreement may thereafter be brought into force on the date of the last written notification of completion by the parties of their internal procedures necessary for its entry into force.

The proposed Agreement provides a comprehensive framework for peaceful nuclear cooperation with Russia based on a mutual commitment to nuclear non-proliferation. It has a term of 30 years, and permits the transfer of technology, material, equipment (including reactors), and components for nuclear research and nuclear power production. It does not permit transfers of any Restricted Data, and permits transfers under the Agreement of sensitive nuclear technology, sensitive nuclear facilities, and major critical components of such facilities by amendment to the Agreement. In the event of termination, key non-proliferation conditions and controls continue with respect to material and equipment subject to the Agreement. In our judgment, the Agreement satisfies all requirements of U.S. law for agreements of this type with nuclear weapon state parties to the Treaty on the Non-Proliferation of Nuclear Weapons (NPT).

In accordance with the provisions of section 123 of the Act, the proposed Agreement was negotiated by the Department of State, with the technical assistance and concurrence of the Department of Energy. The proposed Agreement has also been reviewed by the members of the Nuclear Regulatory Commission. Their views have been submitted to you separately.

Russia is a nuclear weapon state party to the NPT. Like the United States, it has entered into a "voluntary offer" safeguards agreement with the International Atomic Energy Agency (IAEA). That agreement gives the IAEA the right to apply safeguards on all source or special fissionable material at peaceful-use nuclear facilities on a Russia-provided list. Russia is a party to the Convention on the Physical Protection of Nuclear Material, which establishes international standards of physical protection for the use, storage, and transport of nuclear material. It is also a member of the Nuclear Suppliers Group, whose non-legally binding Guidelines set forth standards for the responsible export of nuclear commodities for peaceful use. A more detailed discussion of Russia's domestic civil nuclear program and its nuclear non-proliferation policies and practices, including its nuclear export policies and practices, is provided in the Nuclear Proliferation Assessment Statement (NPAS) and in a classified annex to the NPAS submitted to you separately.

In our judgment, U.S. cooperation with Russia in the peaceful uses of nuclear energy under the proposed Agreement will be supportive of U.S. non-proliferation, foreign policy, and commercial interests. We recommend, therefore, that you determine, pursuant to section 123 b. of the Act, that performance of the Agreement will promote, and will not constitute an unreasonable risk to, the common defense and security; and that you approve the Agreement and authorize its execution.

RECOMMENDATION

That you sign the determination, approval, and authorization at Attachment 1 and the transmittal to Congress at Attachment 2. (The transmittal will be held until the Agreement itself is signed.)

Attachments:

1. Draft Determination, Approval, and Authorization
2. Draft Transmittal to the Congress (To be held until after the Agreement is signed)
3. Proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy
4. Unclassified Nuclear Proliferation Assessment Statement

UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D.C. 20555-0001

CHAIRMAN

April 30, 2008

The President
The White House
Washington, D.C. 20500

Dear Mr. President:

In accordance with the provisions of Section 123 of the Atomic Energy Act of 1954, as amended, the Nuclear Regulatory Commission has reviewed the proposed Agreement between the U.S. Government and the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy. It is the view of the Commission that the proposed Agreement includes all of the provisions required by law and that it provides a sufficient framework for civilian nuclear cooperation with Russia. The Commission recommends that you make the requisite positive statutory determination, and that you approve the proposed Agreement and authorize its execution.

Respectfully,

Dale E. Klein

AGREEMENT BETWEEN THE GOVERNMENT OF THE UNITED STATES OF AMERICA AND THE GOVERNMENT OF THE RUSSIAN FEDERATION FOR COOPERATION IN THE FIELD OF PEACEFUL USES OF NUCLEAR ENERGY

The Government of the United States of America and the Government of the Russian Federation, hereinafter referred to as the Parties;

Convinced that the use of nuclear energy for peaceful purposes is a reliable basis for meeting national energy sector requirements in a manner that is sustainable, environmentally safe, and economically beneficial;

Seeking to expand and enhance mutually beneficial cooperation in the field of the peaceful uses of nuclear energy on a stable, reliable, and predictable basis;

Recognizing that the expansion and enhancement of cooperation between the United States of America and the Russian Federation on an equal footing will help strengthen international stability, as well as promote political and economic progress;

Taking into account that both the United States of America and the Russian Federation have achieved an advanced level in the use of nuclear energy for production of electric power and in the development of nuclear industry and scientific research in this field, and guided by the common goals of achieving a higher level of safety and protection of populations and the environment;

Mindful of their respective obligations under the Treaty on the Non-Proliferation of Nuclear Weapons of July 1, 1968 ("NPT"), to which both the United States of America and the Russian Federation are parties;

Reaffirming their commitment to the international development and use of nuclear energy for peaceful purposes that are consistent with the provisions of the NPT;

Taking into account that the United States of America and the Russian Federation are members of the International Atomic Energy Agency ("IAEA");

Affirming their support for the objectives and Statute of the IAEA and their commitment to the Guidelines of the Nuclear Suppliers Group;

Acknowledging the importance of the provision of nuclear fuel supply assurances under the auspices of the IAEA;

Acknowledging the need for measures for the physical protection of nuclear material and facilities and affirming compliance with the obligations set forth in the Convention on the Physical Protection of Nuclear Material of October 26, 1979, to which the United States of America and the Russian Federation are parties;

Expressing a firm commitment to strengthening the international regime of nuclear non-proliferation and IAEA safeguards;

Noting the need to establish conditions governing the transfer for peaceful purposes of nuclear material, relevant equipment and technologies between the United States of America and the Russian Federation that avoid interference in the civilian nuclear programs of the United States of America and the Russian Federation;

Mindful that peaceful nuclear activities must be undertaken taking into account the need to ensure protection of the international population and environment from radioactive, chemical and thermal contamination;

Have agreed as follows:

ARTICLE I

For the purposes of this Agreement, the terms listed below shall have the following meanings:

1. "Component" means a component part of equipment or other item so designated by agreement of the competent authorities of the Parties;

2. "Equipment" means any reactor, other than one designed or used primarily for the production of plutonium or uranium-233, or any other item so designated by agreement of the competent authorities of the Parties. "Reactor" means any apparatus, other than a nuclear weapon or other nuclear explosive device, in which a self-sustaining fission chain reaction is maintained. The phrase "designed or used primarily for the production of plutonium or uranium-233" shall not apply to breeder reactors that do not produce nuclear material for use in nuclear explosive devices, nor with respect to reactors primarily used for the production of plutonium-238;

3. "High enriched uranium" means uranium enriched to twenty percent or greater in the isotope uranium-235;

4. "Information" means scientific, commercial or technical data or information in any form that are appropriately designated by agreement of the competent authorities of the Parties to be provided or exchanged under this Agreement;

5. "Low enriched uranium" means uranium containing less than twenty percent of the isotope uranium-235, but more than the content of uranium-235 in natural uranium;

6. "Major critical component" means any part or group of parts essential to the operation of a sensitive nuclear facility;

7. "Moderator material" means heavy water, or any other material suitable for use in a reactor to slow down neutrons and increase the likelihood of further fission, as jointly designated by the competent authorities of the Parties;

8. "Nuclear material" means source material and special fissionable material, and includes, *inter alia*, irradiated source material and irradiated special fissionable material. "Source material" means uranium containing the mixture of isotopes occurring in nature; uranium depleted in the isotope uranium-235; thorium; any of the foregoing in the form of metal, alloy, chemical compound, or concentrate; any other material containing one or more of the foregoing in such concentration as the Board of Governors of the IAEA shall from time to time determine; and such other materials as the Board of Governors of the IAEA shall from time to time determine or as may be agreed by the Parties. "Special fissionable material" means plutonium, uranium-233, uranium enriched in the isotopes uranium-233 or uranium-235; any material containing one or more of the foregoing; and such other fissionable material as the Board of Governors of the IAEA shall determine or as may be agreed by the Parties. "Special fissionable material" does not include "source material." Any determination by the Board of Governors of the IAEA under Article XX of the IAEA Statute or any determination by the Board of Governors of the IAEA that otherwise amends the list of materials considered to be "source material" or "special fissionable material" shall have effect for the purposes of this Agreement only when the Parties have informed each other in writing that they accept this amendment. For the purposes of this Agreement, "plutonium" does not include plutonium with a content of the isotope plutonium-238 exceeding eighty percent;

9. "Peaceful purposes" or "peaceful use(s)" include the use of information, nuclear material, moderator material, equipment and components in such fields

as scientific research, electric power generation, medicine, agriculture and industry, but do not include their use in, or use for research on or development of, any nuclear explosive devices or any military purposes. Military purposes shall not include provision of power for military bases drawn from any power network, production of radioisotopes to be used for medical purposes in military hospitals, and other similar purposes as may be agreed by the Parties;

10. "Authorized person" means any individual subject to the jurisdiction of the United States of America and any legal entity, including a joint venture or partnership, subject to the jurisdiction of either Party, that is authorized by the relevant Party to implement cooperation under this Agreement, but does not include the Parties to this Agreement;

11. "Restricted Data" means all data concerning (1) design, manufacture or utilization of nuclear weapons, (2) the production of special fissionable material, or (3) the use of special fissionable material in the production of energy, but shall not include data that the Government of the United States of America has declassified or removed from the category of Restricted Data;

12. "Russian Federation State Secret Information" means information protected by the Russian Federation in the area of its military, foreign policy, economic and other activities, whose dissemination could be detrimental to the security of the Russian Federation;

13. "Sensitive nuclear facility" means any facility designed or used primarily for uranium enrichment, reprocessing of irradiated nuclear material, heavy water production, or fabrication of nuclear fuel containing plutonium;

14. "Sensitive nuclear technology" means any information, including information that is incorporated in equipment or an important component, that is not available to the public and is important to the design, construction, fabrication, operation or maintenance of any sensitive nuclear facility, or any

other such information that may be so designated by one of the Parties prior to its transfer under this Agreement.

ARTICLE 2

The Parties may cooperate in the field of peaceful use of nuclear energy in the following areas:

- Scientific research and development pertaining to the nuclear power sector, including nuclear reactors and their fuel cycles.
- Scientific research and development in the field of controlled thermonuclear fusion, including multilateral cooperation.
- Radioactive waste handling, decommissioning of nuclear facilities and environmental restoration.
- Nuclear and radiation safety, including issues of regulation.
- Nuclear industry and commerce.
- Shipments, based on the provisions of this Agreement, of moderator material, nuclear material, technologies and equipment, as well as services in the area of the nuclear fuel cycle, either for use in the United States of America or in the Russian Federation.
- International issues related to the peaceful use of nuclear energy, including issues of non-proliferation, IAEA safeguards, and environmental protection.
- Other areas that may be agreed upon by the Parties in writing.

ARTICLE 3

1. The Parties shall cooperate in the field of peaceful use of nuclear energy in accordance with the provisions of this Agreement and the respective legislation, regulations, norms and license requirements of the United States of America and the Russian Federation as may be applicable, and international agreements to which they are parties.

2. The Parties shall facilitate trade in moderator material, nuclear material, equipment, and technologies, as well as services pertaining to the nuclear fuel cycle, between authorized persons of the United States of America and the Russian Federation in the field of peaceful use of nuclear energy.

3. Authorizations, including import and export licenses, as well as the issuance of authorizations to third parties, relating to trade, industrial operations or nuclear material movements to the territory of the United States of America or of the Russian Federation shall not be used to restrict trade.

4. The cooperation contemplated by this Agreement as cooperation between the Parties may also be carried out between authorized persons.

ARTICLE 4

In conformity with the provisions of this Agreement, the Parties undertake to facilitate commercial relations between authorized persons of the Parties involved in cooperation in the nuclear power sector, which may include, but need not be limited to:

- investment cooperation;
- the establishment of joint ventures;

- environmental projects on an industrial or commercial scale;
- trade in nuclear material, moderator material, and relevant services.

ARTICLE 5

For the purposes of implementation of this Agreement, the Parties hereby designate the following competent authorities:

- For the United States of America, the U.S. Department of State, the U.S. Department of Energy, and the U.S. Nuclear Regulatory Commission.

- For the Russian Federation, the State Corporation for Atomic Energy "Rosatom" and the Federal Service for Environmental, Technological and Nuclear Oversight.

In case of a change in the competent authorities specified in this Article or the designation of new competent authorities, the Parties shall immediately inform each other thereof in writing through diplomatic channels, without amendment to this Agreement.

ARTICLE 6

1. This Agreement does not require the transfer of any information that the Parties are not permitted to transfer under their respective national laws and regulations, or whose transfer is inconsistent with international agreements to which the United States of America or the Russian Federation is party.

2. Restricted Data shall not be transferred by the United States of America under this Agreement.

3. Russian Federation State Secret Information as well as information similar to the information defined in paragraph 11 of Article 1 of this Agreement shall not be transferred by the Russian Federation under this Agreement.

4. The Parties recognize that they may need to protect certain information to be transferred under the terms of this Agreement by one Party to the other in connection with activities undertaken by the Government of the United States of America and the Government of the Russian Federation or on their behalf pursuant to this Agreement. In order to protect such information:

- Protected information transferred by one Party to the other shall be stamped, marked, or designated by the releasing Party as protected in accordance with its national laws and regulations. The medium in electronic, paper, or another format, containing this information, if in English, must have the marking "Protected"; if in Russian, "конфиденциально" [Confidential].

- Protected information transferred by one Party shall be protected by the recipient Party in accordance with its national laws and regulations in a manner at least equivalent to that afforded by the releasing Party. The recipient Party shall not use or permit the use of protected information for any purpose other than that for which it was transferred, and, to the extent permitted by its national laws and regulations, shall not disclose such information or transfer it to any third party not participating in the activities of the two Parties under this Agreement in connection with which the protected information was transferred, without the prior written consent of the transferring Party.

- In accordance with the laws and regulations of the United States of America, protected information transferred to the Government of the United States of America by the Government of the Russian Federation shall be treated as foreign government information transferred in confidence and shall be provided with appropriate protection from disclosure. In accordance with the legislation of the Russian Federation, protected information transferred by the Government of the United States of America to the Government of the Russian Federation shall be handled as official, restricted-distribution information and shall be provided with the appropriate protection from disclosure.

- Each Party shall limit access to protected information to persons who require access to perform a lawful and authorized government function.

ARTICLE 7

1. Nuclear material, moderator material, equipment (except for sensitive nuclear facilities, sensitive nuclear technology and major critical components) and components may be transferred for applications consistent with this Agreement.

2. Sensitive nuclear facilities, sensitive nuclear technology and major critical components may be transferred under this Agreement if provided for by an amendment to this Agreement.

3. Nuclear material may be transferred for use as fuel for reactors, in experiments, for irradiation in reactors, for enrichment to less than 20 percent in the isotope uranium-235, for conversion or fabrication, for temporary storage for purposes of further use, for use as samples, standards, detectors, targets, or for other purposes as agreed by the Parties that are consistent with

the provisions of this Agreement and with the laws and regulations of the United States of America and the legislation of the Russian Federation.

4. Nuclear material, moderator material, equipment or components transferred from the territory of the United States of America to the territory of the Russian Federation, or from the territory of the Russian Federation to the territory of the United States of America, whether directly or through a third country, shall be regarded as having been transferred pursuant to this Agreement only upon confirmation, by the relevant competent authority of the recipient Party to the relevant competent authority of the supplier Party, that such nuclear material, moderator material, equipment or components will be subject to this Agreement.

ARTICLE 8

1. Plutonium, uranium-233 and high enriched uranium, transferred pursuant to the provisions of this Agreement or used in or produced through the use of nuclear material, moderator material, or equipment transferred, shall only be stored in a facility agreed upon by the competent authorities of the Parties.

2. Nuclear material, moderator material, equipment, and components transferred pursuant to this Agreement and any special fissionable material produced through the use of any nuclear material, moderator material, or equipment transferred shall be transferred only to authorized persons, and shall not be transferred beyond the territorial jurisdiction of the recipient Party unless the Parties agree otherwise.

ARTICLE 9

Nuclear material transferred pursuant to this Agreement, and nuclear material used in or produced through the use of nuclear material, moderator material, or equipment transferred, may be altered in form or content only if the Parties agree. The Parties agree that conversion, enrichment to less than twenty percent in the isotope uranium-235, fabrication of low enriched uranium fuel, irradiation or further irradiation, post-irradiation examination, and blending or downblending of uranium to produce low enriched uranium, are permissible alterations in form or content for purposes of this Agreement.

ARTICLE 10

For the purposes of implementing the rights specified in Articles 8 and 9 of this Agreement with respect to special fissionable material produced through the use of nuclear material or moderator material transferred pursuant to this Agreement, and not used in or produced through the use of equipment transferred pursuant to this Agreement, such rights shall in practice be applied to that proportion of special fissionable material produced that represents the ratio of transferred nuclear material or moderator material used in the production of the special fissionable material to the total amount of nuclear material or moderator material so used, and similarly for subsequent generations. The exact procedure for establishing the aforementioned proportion shall be agreed upon by the competent authorities of the Parties.

ARTICLE 11

1. Adequate physical protection, as specified in paragraph 2 of this Article, shall be maintained with respect to nuclear material and equipment transferred pursuant to this Agreement and special fissionable material used in or produced through the use of nuclear material, moderator material, or equipment transferred.

2. With respect to the obligation in paragraph 1 of this Article, each Party shall apply physical protection measures in accordance with its national laws and regulations at levels at least equivalent to the recommendations published in IAEA document INFCIRC/225/Rev.4 entitled "The Physical Protection of Nuclear Material and Nuclear Facilities," and in subsequent revisions of that document accepted by both of the Parties, and the provisions of the Convention on the Physical Protection of Nuclear Material of October 26, 1979 as well as amendments to that Convention in the event of their entry into force for both Parties.

3. The Parties shall consult at the request of either Party regarding the physical protection measures maintained pursuant to this Article.

4. The Parties shall keep each other informed through diplomatic channels of those organizations or authorities responsible for ensuring levels of physical protection for nuclear material and facilities in their territory or under their jurisdiction or under their control and responsible for coordinating response and recovery operations in the event of unauthorized use or handling of nuclear material subject to this Article. Each Party shall also keep the other Party informed through diplomatic channels of the designated points of contact within its national authorized organizations for purposes of cooperation on matters involving transportation of nuclear material from the territory of its country to the territories of other countries and other matters of mutual concern.

5. The provisions of this Article shall be applied in such a manner as to avoid undue interference in the Parties' activities in the field of peaceful use of nuclear energy and to be consistent with prudent management practices required for the safe and economically justified conduct of their nuclear programs.

ARTICLE 12

Nuclear material, moderator material, equipment and components transferred pursuant to this Agreement and nuclear material used in or produced through the use of any nuclear material, moderator material, equipment or components transferred shall not be used for any nuclear explosive devices, for research on or development of any nuclear explosive devices, or for any military purpose. As specified in paragraph 9 of Article 1, military purposes shall not include provision of power for a military base drawn from any power network, production of radioisotopes to be used for medical purposes in a military hospital, and other similar purposes as may be agreed by the Parties.

ARTICLE 13

1. Nuclear material transferred to the Russian Federation pursuant to this Agreement and any other nuclear material used in or produced through the use of nuclear material, moderator material, equipment, or components transferred shall be subject, to the extent applicable, to the Agreement between the Union of Soviet Socialist Republics and the International Atomic Energy Agency for the Application of Safeguards in the Union of Soviet Socialist Republics of February 21, 1985, and the Additional Protocol that entered into force October 16, 2007 between the Russian Federation and the International Atomic Energy Agency to the Agreement between the Union of Soviet Socialist Republics and the International Atomic Energy Agency for the Application of Safeguards in the Union of Soviet Socialist Republics.

2. Nuclear material transferred to the United States of America pursuant to this Agreement and any other nuclear material used in or produced through the use of nuclear material, moderator material, equipment, or components transferred shall be subject, to the extent applicable, to the Agreement between

the United States of America and the IAEA for the Application of Safeguards in the United States of America of November 18, 1977, and an Additional Protocol thereto in the event of its entry into force.

3. The Parties understand that paragraphs 1 and 2 of this Article do not require that the nuclear material referred to in those paragraphs must be in a facility that appears on the recipient Party's list of facilities that are eligible for IAEA safeguards.

4. In the event that the IAEA safeguards agreement referred to in paragraph 1 or in paragraph 2 of this Article is not being implemented, the Parties shall consult and establish a mutually acceptable alternative to that safeguards agreement consistent with their status as nuclear weapon States Parties to the NPT.

5. Each Party shall establish and maintain a system of accounting and control of nuclear material transferred pursuant to this Agreement and nuclear material used in or produced through the use of nuclear material, moderator material, equipment, or components transferred. The procedures for this system shall be those specified in the IAEA safeguards agreement referred to in paragraph 1 or 2 of this Article for the Party concerned, or, if the Parties agree, those specified in any revised version of the relevant safeguards agreement.

6. Upon the request of either Party, the other Party shall inform the requesting Party of the status of all inventories of nuclear material subject to this Agreement.

ARTICLE 14

If an agreement between either Party and another nation or group of nations provides such other nation or group of nations rights equivalent to any or all of those provided for under Article 8 or Article 9 of this Agreement with respect to nuclear material, moderator material, equipment or components subject to this Agreement, the Parties may, upon request of either of them, agree that the implementation of any such rights will be accomplished by such nation or group of nations.

ARTICLE 15

The Parties shall endeavor to avoid taking any actions that would negatively affect cooperation under this Agreement. If either Party does not comply with the provisions of this Agreement, the Parties shall promptly hold consultations on the problem, it being understood that the other Party shall have the right to temporarily suspend or to cease further cooperation under this Agreement.

ARTICLE 16

The Parties shall consult at the request of either Party regarding the implementation of this Agreement. The Parties also intend to consult regarding the development of further cooperation in the field of peaceful use of nuclear energy.

ARTICLE 17

The Parties shall consult, with regard to activities under this Agreement, to identify the world-wide environmental implications arising from such activities and shall cooperate in protecting the international environment from radioactive, chemical or thermal contamination arising from peaceful nuclear activities under this Agreement and in related matters of health and safety.

ARTICLE 18

Any dispute between the Parties concerning the interpretation or application of the provisions of this Agreement shall be promptly discussed by the Parties with a view to resolving that dispute through consultations or negotiations.

ARTICLE 19

The competent authorities of the Parties shall work out appropriate arrangements in order to effectively apply the provisions of this Agreement as they relate to nuclear material, moderator material, equipment and components subject to this Agreement. The principles of fungibility and equivalence shall apply to nuclear material subject to this Agreement. Detailed provisions for applying these principles shall be set forth in a relevant agreement.

ARTICLE 20

1. This Agreement shall enter into force on the date of the last written notification of completion by the Parties of their internal procedures necessary for its entry into force and shall remain in force for a period of 30 years. The term of this Agreement may be extended by mutual agreement of the Parties. This Agreement may be terminated by either Party by sending the relevant written notice to the other Party. In that case the Agreement shall terminate one year from the date of such notice.

2. Notwithstanding the suspension or termination, including by expiration, of this Agreement or of any cooperation hereunder, Articles 8, 9, 10, 11, 12 and 13 of this Agreement shall continue in effect so long as any nuclear material, moderator material, equipment or component subject to these Articles remains in the territory of the United States of America or the Russian Federation or under the jurisdiction or control of either Party anywhere, unless such item is no longer usable for any nuclear activity relevant from the point of

view of international safeguards or has become practicably irrecoverable, or unless otherwise agreed by the Parties.

DONE at Moscow, this 6th day of May, 2008, in duplicate, each in the English and Russian languages, both texts being equally authentic.

FOR THE GOVERNMENT OF THE UNITED STATES OF AMERICA:	FOR THE GOVERNMENT OF THE RUSSIAN FEDERATION:

NUCLEAR PROLIFERATION ASSESSMENT STATEMENT

**Pursuant to Section 123 a. of the
Atomic Energy Act of 1954, as Amended,
With Respect to the Proposed Agreement Between the
Government of the United States of America and the
Government of the Russian Federation
For Cooperation in the Field of Peaceful Uses of Nuclear Energy**

INTRODUCTION

This Nuclear Proliferation Assessment Statement (NPAS) relates to the proposed Agreement Between the Government of the United States of America and the Government of the Russian Federation for Cooperation in the Field of Peaceful Uses of Nuclear Energy (the Agreement). The Agreement is being submitted to the President jointly by the Secretary of State and Secretary of Energy for his approval and authorization for signature.

Section 123 a. of the Atomic Energy Act, as amended (the Atomic Energy Act or Act), provides that an NPAS be submitted by the Secretary of State to the President on each new or amended agreement for cooperation concluded pursuant to that section. Pursuant to section 123 a., the NPAS must analyze the consistency of the text of the proposed agreement with all the requirements of the Act, with specific attention to whether the proposed agreement is consistent with each of the criteria set forth in that subsection, and address the adequacy of the safeguards and other control mechanisms and the peaceful use assurances contained in the agreement for cooperation to ensure that any assistance furnished thereunder will not be used to further any military or nuclear explosive purpose.

With this statutory mandate in mind, this NPAS: (a) provides background information on the Russian civil nuclear program, on the nonproliferation policies of the Russian Federation including collaboration with the United States on important nonproliferation initiatives, and on existing Russian civil nuclear cooperation with the United States (Part I); (b) describes the nature and scope of the cooperation contemplated in the proposed Agreement (Part II); (c) reviews the applicable substantive requirements of the Act and the Nuclear Non-Proliferation Act of 1978 (NNPA) and details how they are met by the proposed Agreement (Part III); and (d) sets forth the net assessment, conclusions, views, and

recommendations of the Department of State as contemplated by section 123 a. of the Act (Part IV).

I. Background on Russia's Civil Nuclear Program, Non-Proliferation Policies and Practices, and Current Civil Nuclear Cooperation with the United States

The Nuclear Fuel Cycle in the Russian Federation

After the dissolution of the Soviet Union in December 1991, the Russian Federation (Russia) inherited 80 percent of the former Soviet Union nuclear complex, which included both military and civilian institutions and facilities. In 1992, the Ministry for Atomic Energy (MinAtom) succeeded the Soviet Ministry of Atomic Power and Industry. As a result of government restructuring, MinAtom became the Federal Atomic Energy Agency (FAEA, known as Rosatom) in 2004, responsible for all nuclear industry and accountable directly to the President despite being stripped of its ministerial title.

On December 3, 2007, President Putin signed the federal law to convert Rosatom from a federal agency to a government-owned corporation. The new corporation is responsible for both the civilian and defense nuclear programs, and for the implementation of government policy in the nuclear arena. On December 12, 2007, Sergei Kiriyenko was appointed the head of the new Rosatom Corporation.

Rosatom is divided into several branches, including the primary technical branches: Nuclear Weapons Complex; Nuclear Power; Nuclear Science and Technology; and Nuclear Safety. The Nuclear Weapons Complex is divided into two primary divisions: Development and Testing, and Nuclear Weapons Production. The Development and Testing division includes two major design centers – the All-Russian Scientific Research Institute for Experimental Physics in Sarov and the All-Russian Scientific Research Institute for Technical Physics in Snezhinsk; five research institutes – the All-Russian Scientific Research Institute of Automatics in Moscow, the All-Russian Scientific Research Institute of Measuring Systems in Nizhniy Novgorod, the All-Russian Scientific Research Institute of Pulse Technology in Moscow, the Design Bureau of Automotive Transport Equipment in Mytishchi-7, Moscow, and the All-Russian Scientific Research Institute of Strategic Stability in Moscow; and Expedition No. 2 Novaya Zemlya, a mining enterprise at the Central Test Site on Novaya Zemlya in the Arkhangelsk region.

The Nuclear Weapons Production division of Rosatom includes two nuclear weapons production plants – Elektrokhimpribor Combine in Lesnoy and the Instrument-Making Plant in Trekhgornyy; a fissile material production site – Mayak Production Association in Chelyabinsk; and several component manufacturing sites including the Urals Electromechanical Plant in Yekaterinburg, the Sever Production Association in Novosibirsk, the Start Production Association in Zarechnyy, and the Bazalt Company in the Saratov region. Russia has reduced the overall number of sites that work on nuclear weapons manufacturing but has continually maintained its technical, production, and test capabilities.

Russia's civilian nuclear industry covers every stage of the nuclear fuel cycle, including uranium mining, milling, conversion, enrichment; uranium and mixed-oxide (MOX) fuel fabrication; spent fuel storage; reprocessing; and waste management.

Rosatom is seeking to increase its uranium mining capacity, which was limited after the break-up of the Soviet Union. Russia has reestablished collaboration in this area with former Soviet states such as Kazakhstan, Kyrgyzstan, Ukraine, and Uzbekistan. To further secure its access to uranium reserves, Russia is pursuing cooperation with countries beyond the former Soviet Union such as Australia, Canada, South Africa, Namibia, and Brazil. The Priargunsky Industrial Mining and Chemical Association in Russia currently mines approximately 3,500 tons of uranium annually. Russia hopes to increase output of its mines to 7,500 tons/year by 2020.

Russia possesses substantial recoverable resources of uranium, with approximately 5 percent of the world's reasonably assured resources. Russia holds a sizeable stockpile of low enriched uranium (LEU) and highly enriched uranium (HEU), which it relies upon to meet its domestic and international needs in the commercial nuclear power sector.

Russia operates four enrichment plants totaling approximately 24 million kg separative work units/year, located in Novouralsk, Zelenogorsk, Angarsk, and Seversk. The facilities at Novouralsk and Zelenogorsk service foreign demand for enriched uranium. The Angarsk and Seversk facilities specialize in enrichment of reprocessed uranium.

In 2006, Russia announced the creation of the International Uranium Enrichment Center (IUEC), which will be a privately-held multi-national venture

located at the Angarsk Electrochemical Combine. Russia will maintain a majority share of the IUEC. The center is intended to help Russia increase its market share as a supplier of enriched uranium and uranium enrichment services to the international nuclear market. Russia has stated that establishment of the IUEC will reduce the risk of nuclear proliferation by allowing a limited number of countries to maintain control of the uranium enrichment services while making the facility available to countries that need the enrichment capacity but without access to the enrichment technology itself. The facility has been placed on Russia's list of facilities eligible for International Atomic Energy Agency (IAEA) safeguards.

Nuclear fuel fabrication is carried out at two plants – Elektrostal and Novosibirsk – with a combined capacity of 2,600 tons of heavy metal per year. The plant at Elektrostal produces fuel assemblies for both Russian and European reactors using fresh and recycled uranium and is the principal exporter of fuel assemblies. The plant at Novosibirsk produces fuel for the VVER-440 and -1000 reactors. Russia plans to upgrade fuel production capabilities and modernize some of the lines and techniques. Upgrades worth $200M are planned from 2007-2015.

At the time of this NPAS, Russia was operating 31 civilian nuclear power reactors with a total capacity of 21,743 megawatt electric. Until recently, it had also been operating three plutonium production reactors, two in Seversk and one in Zheleznogorsk. However, one of the Seversk production reactors was shut down on April 20, 2008, and the other is scheduled to be shut down on June 5, 2008. This will end production of up to one-half ton per year of weapon-grade plutonium at each of the two reactors. The Agreement Between the Government of the United States of America and the Government of the Russian Federation Concerning Cooperation Regarding Plutonium Production Reactors, signed at Moscow September 23, 1997, as amended (PPRA) calls for the remaining production reactor at Zheleznogorsk to cease operation by the end of 2010.

Rosatom officials have publicly stated their intention to increase total domestic electricity generated by nuclear power from 16 percent to 23 - 25 percent by 2030. To that end, Rosatom has announced its intention to construct 10 new nuclear power plants by 2015 with 42 new reactors to be completed by 2030. Russia has said publicly that fast breeder reactors and MOX fuel will be the foundation of its nuclear program from 2020-2022 and beyond. In addition, Russia is focusing on floating reactors to provide power to remote regions.

Russia is also focused on extending the lifetime and improving the operation of existing reactors with higher quality fuels and greater efficiency in operation.

For example, in the case of the BN-600 fast breeder reactor currently operating at Beloyarsk, improved efficiencies have stretched the period between refueling to as much as 560 days.

Russia continues to reprocess spent fuel from the three plutonium production reactors at Seversk and Zheleznogorsk. The Mayak Production Association RT-1 facility was designed to reprocess up to 400 MT per year but currently operates at about a third of capacity. Reprocessing is critical to the Russian nuclear power program because it provides reprocessed uranium and reactor-grade plutonium that can be used in fast breeder reactors. Russia has announced that it plans to build a pilot scale facility for reprocessing VVER-1000 spent nuclear fuel at Zheleznogorsk and a full-scale reprocessing plant with up to 3,000 tons/year in the future.

Currently, an interim spent fuel storage facility is in operation in Zheleznogorsk and it is being expanded to accommodate more material. The Mining and Chemical Combine in Zheleznogorsk may become a permanent disposal site, as a dry storage facility is being constructed there.

The potential co-location of a spent fuel storage facility and a reprocessing plant in Zheleznogorsk could make it an attractive site for storage of foreign spent fuel. Recently passed laws allow for the import of foreign spent fuel, but it is not clear whether Russia intends to pursue this. In July 2006, Rosatom officials declared that Russia would not import foreign spent fuel other than the VVER-440 and VVER-1000 spent nuclear fuel it currently receives from Ukraine, Bulgaria, and other countries. The stated goal of the Russian government to expand its integrated nuclear services, however, may include acceptance of spent nuclear fuel from Russian-supplied nuclear plants in the future. Russia plans to accept spent nuclear fuel from Iran if the Russian-built power reactor in Bushehr becomes operational.

Restructuring of Russia's Nuclear Industry

Reform of Russia's nuclear industry began with the appointment of Sergey Kiriyenko as Director of Rosatom in 2005. Upon his appointment, Kiriyenko replaced officials in several important positions in an effort to implement Rosatom's goals more efficiently. In June 2006 President Putin approved and signed the concept for the restructuring of Russia's nuclear industry with the goals of expanding both its domestic nuclear capacity and its export of nuclear power reactors and services.

The civilian nuclear program within Russia is being completely reoriented consistent with Russia's overall energy strategy. During 2006, a number of key funding documents were developed and approved. Rosatom is undergoing a large reorganization to support the Russian government plans to expand nuclear power both domestically and internationally, thereby establishing Russia as a world leader in the nuclear market. The budget for the total program is 1,471 billion rubles (approximately $55.5 billion). Of this figure, about 674.8 billion rubles comes from the federal budget and the remainder is made up by the nuclear sector through a variety of means.

A series of comprehensive laws and decrees has been proposed or passed that are intended to increase state control and profitability of Russia's nuclear industry. President Putin has publicly stated a goal of completing the restructuring in 2008. The speed with which much of the legislation has been introduced and passed indicates that the reforms are a top priority for the government and have broad support.

In October 2006, President Putin approved a program, "Development of Nuclear Power Industry Complex in Russia for 2007-2010 and Further to 2015," that outlines the future of Russia's nuclear energy complex. The program provides a comprehensive plan for investment in the Russian nuclear power industry, the lifetime extension of current nuclear plants, and the construction of new nuclear plants within Russia and abroad.

On January 24, 2007, the Russian legislature – the lower and upper houses together – passed the bill commonly referred to as the "Tunnel Law," outlining the future legal changes that would be necessary to achieve the overall restructuring of the civil nuclear industry, as well as creating the legal basis for a new vertically-integrated holding company – Atomnyy Energopromyshlennyy Kompleks, popularly known as "Atomenergoprom" or "Atomprom," – that would act as a management company bringing together the various entities involved in the civilian nuclear sector.

The creation of Atomenergoprom is the cornerstone of the reform efforts; it will control products and services associated with every stage of the civil nuclear fuel cycle, ranging from uranium mining to the construction and management of nuclear power plants and reprocessing. The restructuring will also establish two primary branches under Rosatom – the nuclear power branch, which will be open

to international and industry standards, and the nuclear weapons branch, which will maintain a closed defense posture.

On February 6, 2007, President Putin signed the restructuring bill, thereby making it a federal law to allow private entities to own nuclear materials, installations, and facilities. Of significance, the bill recognizes the rights of foreign states to retain ownership over material processed in Russia. This change should facilitate the operation of the Angarsk IUEC joint-venture between Russia, Kazakhstan, and other potential partner nations.

The law also will result in the conversion of 55 state owned institutes into joint stock companies in which the Russian state owns the majority or all of the stock. This change is significant and critical to implementing the nuclear power program since it will allow Atomenergoprom and the associated businesses and institutes to work as private companies while continuing under government ownership. In addition, Russia is repurchasing critical industrial manufacturing companies within Russia to ensure the success of their nuclear expansion.

Finally, on 3 December 2007, President Putin signed the law establishing the State Atomic Corporation Rosatom, which changes the current Federal Atomic Energy Agency (also called Rosatom) into a corporation uniting all enterprises of the Russian civilian and military nuclear industry. The State Corporation will consist of civilian, military, research, and safety/waste management subdivisions. The reform took effect in the first quarter of 2008.

This reform does not envision any structural changes for the nuclear weapons complex. Mr. Kiriyenko has stated that the federal budget is adding 60 billion rubles for nuclear armaments, and it may add an additional 38 billion rubles to "military atomic industry development."

In early February 2008, Mr. Kiriyenko was officially removed from his position heading the Rosatom Agency to take his position as the head of the Rosatom State Corporation. A newly established joint stock company, JSC Atomenergoprom, now controls commercial activities including nuclear power generation, nuclear engineering, and the front end of the fuel cycle. Rosatom Corporation, a successor of the Rosatom agency, retains control of defense related work, nuclear science, the back end of the fuel cycle, and nuclear safety.

Federal accounting control for nuclear material and IAEA safeguards would continue to be managed by Rosatom as a government-owned corporation. To meet

its domestic and international obligations for nuclear safety and security Rosatom has established a Federal Target Program for Nuclear and Radiation Safety from 2008 through 2015, funded at approximately $5.5 billion. This funding will cover environmental cleanup, decommissioning of facilities, and spent nuclear fuel reprocessing. Rosatom has established the importance of expanding its nuclear materials control program as key to gaining international credibility for its nuclear programs. Consistent with this goal, Rosatom has established a new branch or department that will be responsible for its civilian and nuclear materials.

Division between Russia's Civil and Military Nuclear Complexes

The "Tunnel Law" calls for the separation of the civil and defense sectors of the Russian nuclear complex and identifies the enterprises that will become joint stock companies under Atomenergoprom. Fifteen facilities were excluded from the restructuring due to their "strategic" value. These facilities, listed below, serve critical roles in the design, testing, and manufacture of nuclear weapons within Russia. Also listed below are six mixed civil-military facilities, portions of which will need to be transferred to military entities to facilitate the privatization of the remaining civilian components.

Strategic Facilities Prohibited from Privatization:

- N.L. Dukhov All-Russian Scientific Research Institute of Automatics (VNIIA), Moscow
- Research Institute of Pulse Technique, (NIIIT), Moscow
- Institute of Strategic Stability, Moscow
- Design Bureau of Automotive Transport Equipment, Mytishchi, Moscow Region
- Ural Electromechanical Plant, (UEMZ), Yekaterinburg
- Elektrokhimpribor Combine Plant, Lesnoy, Sverdlovsk Region
- Sever Industrial Association, Novosibirsk
- All-Russian Scientific Research Institute of Measuring Systems (NIIIS), Nizhniy Novgorod
- Russian Federal Nuclear Center – All-Russian Research Institute of Experimental Physics (VNIIEF), Sarov, Nizhniy Novgorod Region
- "Start" Production Association, Zarechnyy, Penza Region
- Bazalt Company, Raskov village, Saratov region
- Mayak Production Association, Ozersk, Chelyabinsk Region

- Russian Federal Nuclear Center – E.I. Zababakhin All-Russian Scientific Research Institute of Technical Physics (VNIITF), Snezhinsk, Chelyabinsk Region
- Instrument Making Plant, Trekhgornyy, Chelyabinsk Region
- Expedition #2, Novaya Zemlya Island, Arkhangelsk Region

Mixed Civil-Military Facilities:

- Gidropress Experimental Design Bureau, Podolsk, Moscow Oblast
- Siberian Chemical Combine, SCC, Seversk, Tomsk Oblast
- N.A. Dollezhal Research and Development Institute of Power Engineering, NIKIET, Moscow
- Bochvar All-Russian Scientific Research Institute for Inorganic Materials, VNIINM, Moscow
- Krasnaya Zvezda (Red Star) State Enterprise, Moscow
- I.I. Afrikantov Experimental Design Bureau for Machine Building, OKBM, Nizhniy Novgorod

Details have not been made public on how Russia will separate the civil and nuclear facilities, particularly in relation to research centers, which have historically performed work for both sectors, but the President will retain power to determine which facilities remain in the defense sector.

IAEA Safeguards in Russia

In February 1985, the Soviet Union signed a Voluntary Offer Agreement with the IAEA regarding the application of safeguards in the Soviet Union. This agreement is still in force between the Russian Federation and the IAEA. The agreement gives the IAEA the right to apply safeguards on all source or special fissionable material at peaceful nuclear facilities on a list provided by the Soviet Union (now Russian Federation), with a view to enabling the IAEA to verify that such material is not withdrawn from those facilities while under safeguards, except as provided for in the agreement.

As a nuclear weapons state, Russia is not required to place its nuclear activities under IAEA safeguards. To date, Russia has offered to place only some facilities – several power stations and nuclear research reactors, and the newly created IUEC – on its list of designated facilities eligible for IAEA safeguards. To date, none has been selected by the IAEA for the application of safeguards.

In March 2000, Russia also signed with the IAEA an Additional Protocol to the safeguards agreement, which was ratified by the Russian State Duma and the Federation Council in September 2007. It entered into force October 16, 2007. Development of the Model Additional Protocol was initiated in response to the discovery of Iraq's nuclear weapons program in the early 1990s. Additional Protocols are intended to ensure that no State has undeclared nuclear material or activities. As is its right as a nuclear-weapons state, Russia chose to conclude an Additional Protocol that is considerably more limited than the Model Additional Protocol.

Russia's Nuclear Nonproliferation Policies and Practices

Russia is a Nuclear Weapon State Party to the Non-Proliferation Treaty (NPT). It subscribes to the Zangger (NPT Exporters) Committee Guidelines, which harmonize supplier implementation of the NPT requirement for the application of IAEA safeguards on nuclear exports to Non-Nuclear Weapon States, and to the Nuclear Suppliers Group (NSG) Guidelines, which set forth guidelines for the export of nuclear equipment, materials, and technology for peaceful use to be followed by NSG members.

The Russian Federation is cooperating with the United States to promote a number of important initiatives aimed at reducing the risk of nuclear proliferation worldwide. Among these are the following:

- Russia is supporting the initiative known as Reliable Access to Nuclear Fuel (RANF), to develop, in conjunction with other major nuclear fuel suppliers and the IAEA, an international mechanism whereby countries that choose to purchase enriched uranium reactor fuel on the international market in lieu of developing enrichment and reprocessing capabilities of their own and that adhere to agreed nuclear nonproliferation criteria would have reliable access to reactor fuel in the event of an unforeseen disruption in commercial arrangements.

- Russia and the United States issued a Joint Declaration on Nuclear Energy and Nonproliferation in July 2007, in which Presidents Bush and Putin stated their intention to work together and with others to develop a viable alternative to the acquisition of sensitive fuel cycle technologies. This would be presented through the development of an attractive offer to encourage pursuit of nuclear energy without indigenous nuclear fuel cycles.

- Russia has created the IUEC, which the United States regards as potentially an important element of RANF.

- Russia has been working jointly with the United States to develop LEU fuel for use in U.S.- and Russian-designed research reactors in third countries now using HEU fuel, as well as to repatriate fresh and spent HEU fuel from U.S. - and Russian-designed research reactors in third countries. In this connection, the two countries collaborated on the delivery to Libya in January 2006 of replacement Russian LEU fuel to Libya's Russian-supplied research reactor.

- Russia continues to eliminate large stocks of weapons-grade HEU under the 1993 U.S.-Russia HEU Agreement, which will result in the down-blending of 500 metric tons of HEU to low-enriched uranium for use in U.S. civil nuclear reactors.

- The United States and Russia are also making progress through the U.S.-Russia Bratislava Initiative to accelerate security upgrades of Russian nuclear materials and nuclear facilities.

- Under the Global Initiative to Combat Nuclear Terrorism, announced by President Bush and President Putin on July 15, 2006, the two countries are working together to accelerate global cooperation in this area. The United States and Russia co-chaired the first three meetings of the Global Initiative partner nations in Rabat, Ankara, and Astana.

- Russia along with the United States, China, France, Germany, and the United Kingdom (the "P5+1") extended a generous and historic offer in June 2006 to Iran to entice the regime to suspend its proliferation sensitive nuclear activities and engage in negotiations on the future of its nuclear program. A core element of this offer was Russia's proposal for an enrichment consortium, based in Russia, in which Iran would have ownership but no access to sensitive technology. Additionally, Russia has voted in favor of four UN Security Council resolutions, three of which have imposed Chapter VII sanctions, in response to Iran's failure to comply with its international nuclear obligations.

- Russia shares the U.S. goal of achieving the complete denuclearization of the Korean Peninsula by peaceful means, and has been a constructive partner

in the Six-Party Talks. Russia supported U.S. efforts in the United Nations Security Council to secure a resolution condemning North Korea's July 2006 missile tests, and also supported a Chapter VII sanctions resolution against North Korea after its October 9, 2006 nuclear test.

In general, the Russian Government has maintained a responsible approach with respect to its civil nuclear cooperation with Non-Nuclear Weapon States. Its cooperation with a few notable states, however, has been problematic and requires particular mention.

Russian Nuclear Cooperation with Iran

The United States has received assurances from Russia at the highest levels that its government would not tolerate cooperation with Iran in violation of its UN Security Council obligations, particularly those enumerated in UNSCRs 1737, 1747, and 1803. Russian President Putin signed a decree on November 28, 2007 to implement fully UNSCRs 1737 and 1747.

Russia's nuclear cooperation with Iran dates back to the mid-1990s. It began during a time of great economic turmoil in Russia, and was seen as a mechanism for bringing in much needed foreign currency. This cooperation is focused on the construction of Unit 1 of the Bushehr Nuclear Power Plant (BNPP), a 1,000 megawatt electric light water power reactor. Construction of this reactor and an identical reactor (Unit 2) first began in 1975, prior to the Iranian Revolution, by the West German firm Kraftwerke Union. However, work on the project was halted when the Iranian revolution began in 1979. During the 1980-1988 Iran-Iraq War, both of the incomplete reactors were targeted by Iraqi military strikes and severely damaged.

At the end of the war, Iran solicited bids to repair and finish both reactors. In 1995, Russia and Iran signed an agreement worth approximately $800 million, according to press reports at the time, to complete the construction of the first unit of the BNPP. Additional light water power reactors were also discussed, including finishing the second unit of the BNPP, though only the first unit has been put to a contract.

Since the conclusion of the 1995 contract, the United States made its concerns with respect to the BNPP project known both privately and publicly to the Russian government. The United States also has stressed to the Russian government the U.S. view that no discussion of new reactors at Bushehr should

commence until the international community's concerns with respect to Iran's nuclear program are satisfied. Those concerns led the United States to inform Russia that the United States would not be in a position to negotiate or conclude an Agreement for Cooperation in the Peaceful Uses of Nuclear Energy until the U.S. and Russian positions on Iran's nuclear program converged. This view continued through to the present Administration, the policy of which has been to press Russia on steps that should be taken to reduce the inherent proliferation risk presented by providing a nuclear reactor to Iran.

In that light, the United States advocated the establishment of unique measures that would minimize the latent proliferation threat of this reactor. Particular measures include: just-in-time delivery of fresh fuel to prevent the stockpiling of nuclear fuel at the reactor; and fresh fuel delivery and spent fuel take-back that both eliminate the necessity for Iran to possess the complete nuclear fuel cycle as well as ensure that spent fuel containing plutonium that could be used in nuclear weapons spends the minimum time necessary in Iran. Russia responded positively to these views, including by incorporating the fresh fuel delivery and spent fuel take-back provisions in a Russian-Iranian agreement of February 28, 2005. The United States also engaged Russia in a dialogue about the safeguards system at the BNPP and on efforts to ensure that the risk of nuclear material diversion from the plant is mitigated; to that end, the United States has encouraged Russia to work with the IAEA and Iran to conclude a facility-specific safeguards agreement (called an "INFCIRC/66" agreement) for the BNPP so as to have something in place in the event Iran makes good on its occasional threat to withdraw from the NPT. A facility-specific safeguards agreement of this type would provide a legal basis for safeguards in perpetuity at BNPP in that event.

The United States also expressed concern that the BNPP project could be used by Iran to obtain equipment, materials, and technology of serious proliferation significance under the guise of this civil use of nuclear energy. To that end, we have stressed to Russia the importance of conducting comprehensive and thorough reviews of any attempt to export nuclear or dual-use technology to Iran to ensure that the intended end user is legitimate and will only use the item in question in activities that are not of proliferation concern. The United States has echoed this call in its engagement with international partners worldwide. In recognition of this risk, the UN Security Council, through the adoption of resolutions 1737 and 1803 in December 2006 and March 2008, prohibited the transfer of NSG-controlled nuclear and dual-use items to Iran, unless for exclusive use in light water reactors, and imposed procedures that all states must implement should they transfer items to Iran under the light water reactor exemption.

Construction of the BNPP was to be completed in 2001, but the deadline has been moved back several times as a result of the difficulty of adapting the original West German design and technology to meet Russian specifications; issues between Russia and Iran, including financial issues between the Russian contractors and the Iranian government; and third party supply problems. In September 2006, the Russian and Iranian governments announced that they would complete the construction of the reactor in 2007 with the first core-load of reactor fuel to be delivered by March 2007 and the reactor coming on-line in September 2007. In February and March of 2007, Russia noted that, due to Iran's failure to provide adequate payment on the agreed-upon schedule and to continued third party supply problems, the first shipment of nuclear fuel would be delayed indefinitely; however, Russia pledged its commitment to the project. On December 16, 2007, Russia began shipping the first core-load of nuclear fuel to Bushehr, after some success in resolving both of these issues; these shipments were completed by the end of January 2008. Within the context of the steps taken by Russia to strengthen the nonproliferation measures associated with the Bushehr reactor, the United States supported Russia's delivery of nuclear fuel to Bushehr as a clear demonstration that Iran does not need to possess the full nuclear fuel cycle – and, in particular, uranium enrichment – in order to enjoy the peaceful uses of nuclear energy. Russia and Iran have presented some conflicting information regarding the start-up and specific date of full operational status for the reactor, but both have asserted that the reactor will come on-line in 2008.

Russia has also supported: the IAEA's intense investigation into Iran's nuclear program; increasing pressure on Tehran to comply with its obligations, including through the adoption of UN Security Council Resolutions 1696 (July 2006), 1737, 1747 (March 2007), and 1803, with the latter three imposing Chapter VII sanctions; and the offer in June 2006 to Tehran to entice the regime to suspend its proliferation sensitive nuclear activities and engage in negotiations on the future of its nuclear program.

In light of Russia's demonstrated willingness, as outlined above, to work together with the United States and other nations to seek a resolution of the issues raised by Iran's nuclear program, the United States entered into negotiations with Russia in October 2006 on the U.S.-Russia agreement for peaceful nuclear cooperation to which this NPAS relates. Negotiations were essentially completed in April 2007. On June 29, 2007, the text of the proposed Agreement was initialed at Moscow by U.S. Ambassador William Burns and Rosatom Deputy Director Nikolay Spasskiy and submitted for review in the two capitals.

Additional details on the proliferation concerns associated with Russia-Iran cooperation and efforts to mitigate them are presented in the classified annex to this NPAS.

Russian Nuclear Cooperation with India

Russia is cooperating with India in the construction of two VVER-1000 power reactors for India's Kudankulam Atomic Power Project. Construction delays have pushed back commissioning until late 2008 or 2009. Russia maintains that this cooperative activity is pursuant to a pre-April 3, 1992 agreement between the former Soviet Union and India, and is therefore "grandfathered" under paragraph 4(c) of the NSG Guidelines from the requirement for full-scope IAEA safeguards (FSS) as a condition for supply of Trigger List items to non-nuclear weapon states such as India. During a January 25-26, 2007 visit to New Delhi by President Putin, the Russian and Indian sides signed a Memorandum of Intent to construct four additional power reactor units at Kudankulam, contingent on an NSG decision (in the context of the U.S.-India Civil Nuclear Cooperation Initiative) to make an exception to the FSS requirement for supply to India.

Since 2001, Russia has also been supplying LEU fuel for India's two U.S.-supplied power reactors at Tarapur. (The U.S. fuel supply was terminated in 1980 following passage of the NNPA, which established FSS as a U.S. export condition for such supply to non-nuclear weapon states, a condition that India, as noted in the preceding paragraph, does not satisfy.) Russia has argued that its supply is consistent with the NSG guidelines. It bases its argument on a provision of the Guidelines that permits supply in exceptional cases when the transfer is deemed essential for the safe operation of existing facilities and safeguards are applied to those facilities. (The Tarapur reactors themselves are under IAEA safeguards, even though India has not accepted full-scope IAEA safeguards.) The United States and nearly all other NSG Participating Governments disagree with the Russian view that the safety exception justifies fresh fuel supply to Tarapur.

If the NSG were to decide by consensus to make an exception to the Guidelines to permit the transfer of Trigger List items to India under safeguards but in the absence of FSS, as envisaged by the July 18, 2005 Joint Statement of President Bush and Prime Minister Manmohan Singh and by the Hyde Act, this would eliminate any question concerning the legitimacy under the Guidelines of Russia's current supply arrangements with India.

Russian Nuclear Cooperation with Burma

On May 15, 2007, Russia's Rosatom and the Ministry of Science and Technology of Myanmar (hereafter referred to as "Burma") signed in Moscow an agreement on the creation of a nuclear research center to include construction of a 10 MW light-water nuclear research reactor in Burma. According to Rosatom's press statement, the reactor will be fueled with uranium enriched to a level "not exceeding" 20 percent. The facility, which will be placed under IAEA safeguards, is intended to help Burmese research in nuclear physics, biotechnology, and material science, as well as to produce medicines. The cooperative agreement also envisions nuclear training in Russia of over three hundred Burmese technicians and scientists to work at the research center.

The United States has on multiple occasions communicated to Russia and to U.S. partners in East and Southeast Asia that it believes the development of nuclear infrastructure of any kind in Burma to be inappropriate, given the current situation in that country. Burma lacks an adequate administrative, legal, technical, financial, and regulatory infrastructure necessary for safe and secure operation of a nuclear reactor. In particular, Burma lacks a national nuclear regulatory authority or a state system of nuclear material accounting and control. Burma is not a party to the Convention on the Physical Protection of Nuclear Material and has not made political commitments to follow the IAEA Code of Conduct on Safety and Security of Radioactive Sources or the Guidance on the Import and Export of Radioactive Sources as IAEA General Conference resolutions have urged all States to do. In addition, Burma does not have in place legislation, procedures, measures, or agencies for basic border control or export/import controls relating to transfers of nuclear and nuclear-related material, equipment, and technology. In the view of the United States, the risk of proliferation, accident, sabotage, misapplication, or diversion of nuclear and nuclear-related material, equipment, and technology is unacceptably high. The United States continues to advise Russia, and other countries as well, on the inadvisability of nuclear cooperation with Burma.

Russia and Burma reportedly first concluded a bilateral nuclear agreement in 2002, though implementation was delayed due to Russian concerns that Burma was unable to cover the advance costs of the facility's construction. In 2003, Moscow informed the IAEA that it planned to provide training in nuclear science to about 300 Burmese citizens per year. According to Burmese government officials, more than 1,000 scientists, technicians, and military personnel have received nuclear training in Russia over the past six years.

The agreement announced May 15, 2007, provides merely a framework for nuclear cooperation between Russia and Burma and includes no details regarding site, costs, and logistics of constructing the center, or any details regarding nuclear training to be provided. Specifics regarding implementation of the agreement remain subject to negotiation between Russia and Burma. Russian authorities have asserted publicly that the center will be subject to IAEA safeguards. Burma is a party to the NPT; its Comprehensive Safeguards Agreement with the IAEA came into force in 1995. However, Burma has yet to rescind its Small Quantities Protocol, which provides for less intensive application of safeguards in countries that possess only small quantities of nuclear material, and has not signed or ratified an Additional Protocol with the IAEA.

Current U.S.-Russia Nonproliferation Programs

The United States continues to make great strides through its nonproliferation and threat reduction programs to reduce weapons of mass destruction (WMD), delivery systems and related materials, to enhance security of those which remain, to prevent proliferation of WMD expertise, materials and technologies, and to redirect former WMD personnel. Threat reduction programs were initiated in Russia following the collapse of the Soviet Union. In particular, the U.S. Departments of Energy, Defense, and State have implemented a broad range of nonproliferation and threat reduction efforts over the past decade to reduce the risk posed by unsecured chemical, biological, radiological, and nuclear (CBRN) expertise, materials, and technologies in Russia.

The Department of State focuses nonproliferation and threat reduction efforts in Russia on: 1) engagement and redirection of personnel with WMD and related expertise, including nuclear expertise; 2) export control and related border security (EXBS) assistance to improve control, detection, and interdiction capabilities related to transfers of WMD, conventional weapons, and related items; and 3) response to unanticipated nonproliferation opportunities and critical emergent needs through the Nonproliferation and Disarmament Fund (NDF).

The Department of Defense focuses threat reduction efforts in Russia on: 1) upgrades to security systems at Russian nuclear warhead storage sites, installation of an automated inventory management system for warheads slated for dismantlement, and transport of warheads for dismantlement or consolidated storage; 2) chemical weapons destruction; 3) dismantlement of intercontinental ballistic missiles, submarine launched ballistic missiles, and launchers; 4) security for dangerous pathogen collections; 5) engagement of former biological weapons

scientists and those with weapons-related expertise in mutually beneficial research; and, 6) elimination of WMD infrastructure.

The Department of Energy works with Russia on threat reduction efforts to: 1) enhance security of Russian fissile material and nuclear warhead sites not addressed by the U.S. Department of Defense; 2) enhance nuclear detection at major airports and border crossings; 3) shut down and monitor plutonium production reactors and ensure plutonium oxide from the reactors is not used in nuclear weapons; and, 4) facilitate the transition of scientists to commercial civilian projects.

On February 18, 1993, in one of our earliest and most significant nonproliferation cooperation programs, the United States and Russia signed the Agreement Concerning the Disposition of Highly Enriched Uranium Extracted from Nuclear Weapons ("the HEU Agreement"). Under this nonproliferation agreement, Russia committed to downblending 500 metric tons of HEU from dismantled Russian nuclear weapons, and converting it to LEU for use as power reactor fuel in the United States. The Department of Energy (DOE) and the Russian Federal Agency for Atomic Energy (Rosatom) have negotiated and implemented confidence-building transparency measures including the conduct of six Special Monitoring Visits (SMVs) per year at each of four Russian processing facilities to confirm that the nonproliferation objectives are met. Russia also has the right to conduct SMVs at seven facilities in the United States.

The purchase of the downblended HEU is implemented through a commercial contract between the United States Enrichment Corporation (USEC) and Technabsexport (Tenex). USEC purchases from Tenex the downblended HEU that is converted to LEU domestically in Russia. The LEU is then fabricated into fuel at U.S. fuel fabricators and used in U.S. commercial reactors. An estimated 322 metric tons of HEU has been downblended to date – enough material for nearly 12,880 nuclear weapons, based on the IAEA definition of a significant quantity of HEU.

The United States and Russia have also collaborated extensively in nuclear-related areas as allowed by law. At a February 2005 meeting in Bratislava, President Bush and President Putin committed to expanding and deepening cooperation on nuclear security, including a commitment to accelerate ongoing cooperation on security upgrades at Russian facilities with the goal of completing most of this work by the end of 2008. The United States and Russia also committed to enhance cooperation on emergency response capabilities to deal with

the consequences of a nuclear/radiological incident, including the development of additional technical methods to detect nuclear and radioactive materials that are, or may be, involved in the incident.

To date, the United States and Russia have secured hundreds of nuclear warheads at approximately 88 percent of the Russian warhead sites of concern, including all 39 Russian Navy nuclear sites and all 25 Strategic Rocket Forces sites. The United States and Russia have also completed security upgrades at 193 buildings containing hundreds of metric tons of weapons-usable nuclear material at 11 Russian Navy Fuel sites, 7 Rosatom weapons complex sites, 12 Rosatom civilian sites, and 6 non-Rosatom civilian sites. Work is underway at the balance of the warhead and material sites, most of which will be completed on an accelerated basis by the end of 2008.

In addition, since the inception of threat reduction assistance programs, the United States has employed tens of thousands of former weapons personnel in peaceful pursuits at over 200 institutes. Over 550,000 sq. ft. of floor space of Russia's nuclear weapons complex has been converted to civilian industry. Nuclear weapons assembly at the Avangard plant and at Zarechny have shut down, and only two facilities in Russia continue to assemble or disassemble nuclear warheads.

Through the Elimination of Weapons-Grade Plutonium Production program, the United States has been working with Russia to facilitate the shut down of Russia's last three plutonium-producing reactors, two at Seversk and one at Zheleznogorsk. The first of the Seversk reactors was shut down on April 20, 2008. These reactors will be replaced by new and refurbished fossil-fuel plants that will supply heat and electricity to those two cities. Following shutdown, these reactors will be monitored annually under the PPRA to ensure they remain inoperable until permanently dismantled. In cooperation with the United States, Russia is also permanently disposing of 34 metric tons of its surplus weapon-grade plutonium by irradiating it as mixed-oxide fuel in nuclear reactors.

Cooperation under the Second Line of Defense program began in 1998 to strengthen Russia's capability to detect and deter illicit trafficking in nuclear and other radioactive materials across international borders and through the maritime shipping system. Under this program the United States and Russia are jointly working to equip all of Russia's border crossings with radiation detection equipment, for a total of 350 sites, by the end of 2011. A total of 117 sites in Russia have been equipped at the time of this NPAS.

Current U.S.-Russia Civil Nuclear Cooperation

As previously noted, the 1993 HEU Agreement allows for the purchase of Russian LEU derived from downblended HEU for use in the United States. Under this nonproliferation agreement, 30 metric tons of HEU are converted and processed into about 875 metric tons of low enriched uranium (LEU) annually for use in U.S. commercial reactors. This quantity of LEU meets half of the annual fuel requirements for U.S. nuclear power plants.

To date, Russian imports of LEU into the U.S. market have been restricted to the downblended HEU received under the HEU Agreement. This was mandated by the 1992 Suspension Agreement, which balanced restrictions on Russian imports with a suspension of an antidumping investigation of Russian imports. At the time, both foreign-origin uranium directly imported into the United States and U.S.-origin uranium that had been enriched at an overseas facility and returned to the United States were viewed to be goods subject to such agreements. However, a recent U.S. court decision, which is subject to review by the U.S. Supreme Court, redefined enrichment as a "service" rather than a "good," which would remove enrichment from anti-dumping legislative controls. If not overturned, this court action could open the door for unlimited access of Russian enrichment services into the U.S. market.

In addition, an amendment to the Suspension Agreement was recently signed between the Department of Commerce and Rosatom, allowing for limited amounts of Russian commercial LEU to enter the United States based on a quota system.

Negotiation of the 123 Agreement has proceeded independently of the recent developments with respect to the U.S.-Russia HEU Agreement. The 123 Agreement, if signed and brought into force, is not expected to have any bearing on the continued implementation of the HEU Agreement through its conclusion in 2013. In particular, it is anticipated that any transfers of natural uranium from the United States to Russia in support of the HEU Agreement will continue to be handled as "distributions" by the Department of Energy pursuant to section 64 of the U.S. Atomic Energy Act of 1954, as amended, and therefore take place pursuant to the nonproliferation conditions and controls set forth in a U.S.-Russia exchange of diplomatic notes of March 24, 1999, constituting an agreement between the Government of the United States of America and the Government of the Russian Federation regarding assurances concerning the source material

transferred from the United States to the Russian Federation in implementation of the HEU Agreement, rather than pursuant to the 123 Agreement.

On a bilateral basis, the Department of Energy and Rosatom completed a joint workplan on December 15, 2006, to implement a non-binding initiative to coordinate and enhance global and bilateral nuclear energy cooperation. The areas of potential cooperation outlined in the bilateral action plan are: advanced reactors, exportable small and medium reactors, nuclear fuel cycle technologies, and nonproliferation. Activities for this action plan are underway and meetings have been conducted. In a multilateral setting for civil nuclear cooperation, Russia, along with the other advanced nuclear technology states of China, France, Japan, joined the U.S.-led Global Nuclear Energy Partnership (GNEP). Russia has signed the policy framework document known as the GNEP Statement of Principles and has participated in meetings concerning the development and the direction of the Partnership.

II. Scope of the Cooperation Contemplated in the Proposed Agreement

Article 2 of the proposed Agreement describes in general terms the kinds of cooperative activities envisaged. These include:

- Scientific research and development pertaining to the nuclear power sector.
- Scientific research and development in the field of controlled thermonuclear fusion.
- Radioactive waste handling, decommissioning of nuclear facilities, and environmental restoration.
- Nuclear and radiation safety.
- Nuclear industry and commerce.
- Shipments pursuant to the Agreement of moderator material, nuclear material, technology and equipment.
- Cooperation in issues of nonproliferation, IAEA safeguards, and environmental protection.

Article 3.4 provides that the cooperation envisaged by the proposed Agreement as cooperation between the U.S. Government and the Government of the Russian Federation may also be carried out between their respective authorized persons.

Article 7.4 provides that nuclear material, moderator material, equipment, or components transferred from the territory of one Party to the territory of the other Party, either directly or through a third country, shall be regarded as having been transferred pursuant to the Agreement only upon confirmation by the recipient Party that such items will be subject to the Agreement.

Sensitive nuclear facilities, sensitive nuclear technology, and major critical components may be transferred under the Agreement if provided for by an amendment to the Agreement to permit such transfers (Article 7.2).

The Agreement does not permit transfers under it of Restricted Data or the Russian equivalent of Restricted Data, nor does it permit transfers of Russian State Secret Information (Article 6.2 and 6.3).

The proposed Agreement will have a term of 30 years from the date of its entry into force, and may be terminated by either Party on one year's written notice to the other Party (Article 20.1). In the event of suspension, termination, or expiration of the Agreement, key nonproliferation conditions and controls provided for in the Agreement will continue in effect as long as nuclear items subject to the Agreement remain in the territory of either Party or under the jurisdiction or control of either Party anywhere unless the Parties agree otherwise, or unless such items are no longer usable for any nuclear activity relevant from the point of view of international safeguards or have become practicably irrecoverable (Article 20.2).

III. Substantive Conditions

The proposed Agreement meets the applicable requirements of the Atomic Energy Act and the NNPA.

Section 123 a. of the Act sets forth nine specific requirements that must be met in agreements for cooperation. Sections 402 and 407 of the NNPA set forth supplementary requirements. The provisions contained in the proposed Agreement satisfy these legal requirements as follows:

(1) Application of Safeguards: Under section 123 a.(1), the Government of the Russian Federation (GOR) must guaranty "that safeguards . . . will be

maintained with respect to all nuclear materials and equipment transferred pursuant [to the Agreement] and with respect to all nuclear material used in or produced through the use of such [transferred] nuclear materials and equipment, so long as the material or equipment remains under the jurisdiction or control of [the GOR], irrespective of the duration of the other provisions of the agreement or whether the agreement is terminated or suspended for any reason."

This requirement is satisfied by Articles 13 and 20 of the proposed Agreement. Article 13(2) stipulates that nuclear material transferred to the Russian Federation pursuant to this Agreement and any other nuclear material used in or produced through the use of nuclear material, moderator material, equipment, or components transferred shall be subject, to the extent applicable, to the Agreement between the Russian Federation and the IAEA for the Application of Safeguards in the Russian Federation of February 21, 1985, and an Additional Protocol that entered into force October 16, 2007. Article 13(4) provides for "back-up" safeguards in the event the IAEA safeguards agreement with the GOR is not being implemented. Article 13 is one of the articles that, pursuant to Article 20, continues in effect so long as any nuclear material, moderator material, equipment, or component subject thereto remains in the territory of the United States of America or the Russian Federation or under the jurisdiction or control of either Party to the Agreement anywhere, unless that item is no longer usable for any nuclear activity relevant from the point of view of international safeguards or has become practically irrecoverable, or unless otherwise agreed by the Parties.

(2) Full-Scope Safeguards: The requirement for full-scope safeguards as a condition of cooperation mandated by section 123 a.(2) of the Act is not applicable because the Russian Federation is a nuclear weapon state party to the Treaty on the Non-Proliferation of Nuclear Weapons, done at London, Washington, and Moscow, July 1, 1968.

(3) Peaceful Use: The requirement of section 123 a.(3) of the Act for a guaranty against explosive or military uses of nuclear materials and equipment transferred and special nuclear material produced through the use of such items is met by Article 12 of the proposed Agreement. Moreover, Article 7(2) of the proposed Agreement provides that sensitive nuclear technology may be transferred under the Agreement if provided for by an amendment to the Agreement. Therefore, it is not necessary at this time to include a peaceful uses guaranty with respect to sensitive nuclear technology transferred under the Agreement or special nuclear materials (referred to in the proposed Agreement as "special fissionable

materials") produced through the use of sensitive nuclear technology transferred, as would otherwise be required by section 123 a.(3) of the Act.

(4) Right of Return: The requirement in section 123 a.(4) of the Act that the United States has a right to the return of any nuclear material and equipment transferred pursuant to an agreement for cooperation and any special nuclear material produced through the use of such transferred items in the event of a nuclear detonation by a non-nuclear weapon state cooperating party is inapplicable because the Russian Federation is a nuclear weapon state party to the NPT.

(5) Retransfer Consent: The requirement of section 123 a.(5) of the Act for a guaranty that any material and equipment transferred pursuant to an agreement for cooperation and any special nuclear material produced through the use of such items will not be transferred to unauthorized persons or beyond the jurisdiction or control of the Russian Federation without U.S. consent is met by Article 8(2). A retransfer consent right over Restricted Data (RD) is not provided because RD transfers by the United States of America are prohibited under Article 6(2) of the Agreement.

(6) Physical Security: The requirement of section 123 a.(6) of the Act for a guaranty that adequate physical security will be maintained with respect to any nuclear material transferred pursuant to an agreement of cooperation and any special nuclear material used in or produced through the use of nuclear material or equipment transferred is met by Article 11 of the proposed Agreement.

(7) Enrichment/Reprocessing/Alteration Consent Right: The requirement of section 123 a.(7) of the Act for a guaranty that "no material transferred pursuant to the agreement for cooperation and no material used in or produced through the use of any material, production facility, or utilization facility transferred pursuant to the agreement will be reprocessed, enriched, or (in the case of plutonium, uranium 233, or uranium enriched to greater than twenty percent in the isotope 235, or other nuclear materials which have been irradiated) otherwise altered in form or content without the prior approval of the United States," is met by Article 9 of the proposed Agreement. That Article provides that nuclear material transferred pursuant to the Agreement, and nuclear material used in or produced through the use of nuclear material, moderator material, or equipment transferred, may be altered in form or content only if the Parties agree, and further sets forth the Parties' agreement that conversion, enrichment to less than 20 percent in the isotope uranium-235, fabrication of low enriched uranium fuel, irradiation or further irradiation, post-irradiation examination, and blending or downblending of

uranium to produce low enriched uranium, are permissible alterations in form or content for purposes of the Agreement.

Article 9 prohibits reprocessing and enrichment of nuclear material transferred pursuant to the proposed Agreement, or nuclear material used in or produced through the use of nuclear material, moderator material, or equipment transferred, without prior U.S. consent, by prohibiting *all* alterations in form or content of such nuclear material rather than specifically naming reprocessing and enrichment. Section 123 a.(7) of the Act refers to reprocessing, enriching, or "otherwise" altering in form or content, thereby indicating that reprocessing and enrichment are alterations in form or content. As noted above, Article 9 goes on to provide U.S. consent for certain types of alteration in form or content, including enrichment to less than 20 percent, but does not include reprocessing in the list of activities for which U.S. consent is given.

Article 9 also satisfies section 402(a) of the NNPA, which states that, except as specifically provided in any agreement for cooperation, no source or special nuclear material exported from the United States after the date of the NNPA may be enriched after export without the prior approval of the United States for such enrichment.

(8) Storage Consent Right: The requirement of section 123 a.(8) of the Act for a guaranty of a right of prior U.S. approval over facilities for the storage of specified nuclear materials is met by Article 8(1).

(9) Sensitive Nuclear Technology: The requirement of section 123 a.(9) of the Act pertains to situations that may result when sensitive nuclear technology is transferred pursuant to a section 123 agreement for cooperation. Article 7(2) of the Agreement provides that sensitive nuclear technology, sensitive nuclear facilities, and major critical components may be transferred under the Agreement if provided for by an amendment to the Agreement. Accordingly, the requirement in section 123 a.(9) is not relevant to the proposed Agreement, and the requirement in section 402(b) of the NNPA precluding the transfer of major critical components of facilities for uranium enrichment, nuclear fuel reprocessing, or heavy water production unless an agreement for cooperation "specifically designates such components as items to be exported pursuant to [such] agreement" is also satisfied.

Environmental: Article 17 of the proposed Agreement requires the Parties to consult, with regard to activities under the Agreement, to identify the world-wide

environmental implications arising from such activities and to cooperate in protecting the international environment from radioactive, chemical, or thermal contamination arising from peaceful nuclear activities under the Agreement, thereby satisfying the requirements of section 407 of the NNPA.

The proposed agreement thus satisfies all the substantive requirements specified for agreements for cooperation by the Act and the NNPA.

IV. Conclusion

Entry-into-force of the proposed U.S.-Russia Agreement will put in place a framework for mutually beneficial civil nuclear cooperation between the two countries and provide a foundation for continued collaboration on nuclear non-proliferation goals.

On the basis of the analysis in this NPAS and all pertinent information of which it is aware, the Department of State has arrived at the following assessment, conclusions, views, and recommendations:

1. The safeguards and other control mechanisms and the peaceful use assurances in the proposed Agreement are adequate to ensure that any assistance furnished thereunder will not be used to further any military or nuclear explosive purpose.

2. The Agreement meets all the legal requirements of the Act and the NNPA.

3. Execution of the proposed Agreement would be compatible with the non-proliferation program, policy, and objectives of the United States.

4. Therefore, it is recommended that the President approve and authorize the execution of the proposed Agreement; and that the President determine that the performance of the proposed Agreement will promote, and will not constitute an unreasonable risk to, the common defense and security.