"Status of FMCT and START III"
Los Alamos National Laboratory
April 22, 1997

FMCT

The next year may see action occur on a Fissile Material Cut-off Treaty (FMCT), which would ban the production of fissile material for use in nuclear weapons or other explosive devices. An FMCT is an explicit goal in the document on "Principles and Objectives for Nonproliferation" endorsed at the 1995 NPT Review and Extension Conference, and officials from all five declared nuclear weapon states have said on several occasions that their governments are ready to begin negotiating such a treaty. Indeed, President Clinton has cited an FMCT as his highest arms control priority after CWC ratification. Unfortunately, a few non-aligned movement (NAM) states have delayed any progress on the matter by insisting on linking it to a plan for time-bound nuclear disarmament. It is my hope that we will be able to overcome this current impasse and begin work on this important step toward the ultimate elimination of nuclear weapons as soon as possible.

START III

At the March 21, 1997 Summit in Helsinki, Presidents Clinton and Yeltsin reached an understanding on further reductions in and limitations on strategic offensive arms that will substantially reduce the roles and risk of nuclear weapons as we move forward into the next century.

The Presidents agreed that, once START II enters into force, the United States and Russia will immediately begin negotiations on a START III agreement, which will include, among other

things, the following basic components:

- reductions in deployed strategic nuclear warheads to 2,000 - 2,500 by December 31, 2007;
- measures relating to transparency of strategic nuclear warhead inventories and the destruction of strategic nuclear warheads; and
- efforts to ensure that the current START treaties are made unlimited in duration, to make clear that their arms control benefits are irreversible.

The measures relating to the transparency of strategic nuclear warhead inventories and the destruction of strategic nuclear warheads, and any other jointly agreed technical or organization measures, will promote the irreversibility of deep reductions, including prevention of a rapid increase in the number of warheads. The United States looks forward to developing with Russia measures to implement this new, forward-looking area of arms control. The United States has been thinking about this issue for some time, and we are continuing internal deliberations to define the requirements for a warhead elimination regime.

No previous arms control agreement has required the parties to actually dismantle nuclear warheads. Instead, previous arms control agreements placed limits on delivery systems and launchers. Using launchers and delivery systems as the units of account made good sense because a warhead would have limited value without them, and thus these previous agreements enhance the security and provide other benefits to both sides.

Adding warhead elimination to limits on launchers and delivery vehicles in START III will have two important benefits. First, we believe that a limitation on warheads will have a synergistic effect of making destruction of launchers, delivery systems, and warheads irreversible

because warhead elimination will help provide assurance that a side does not have the capability to reconstitute its forces rapidly by uploading additional warheads on existing delivery systems. The incentive to comply with the agreement will thus be enhanced. Warhead elimination will also help mitigate the "loose nukes" problem by removing fully assembled and transportable nuclear warheads from facilities that may not be safe and secure.

Given the improved political and security environment since the end of the Cold War, we believe that the time is right to make warhead destruction a component of post-START II strategic arms control. By committing to destroy warheads in a formal agreement, beyond those the sides have said they are eliminating unilaterally, the United States and Russia will demonstrate further commitment to their NPT Article VI obligations.

In response to Russian concerns about the high costs of implementing START II by January 1, 2003, the Presidents also reached an understanding that this deadline will be extended to December 31, 2007. This will allow us to, in President Clinton's words, "implement START II in a way that is economically feasible for Russia, but does not in any way compromise the security of the American people". This change must be submitted to the Russian Duma and U.S. Senate for their approval. To ensure that both sides still achieve definite security benefits from START II at the earliest possible time, the Presidents agreed on the deactivation by December 31, 2003, of all the strategic nuclear delivery vehicles to be eliminated under START II, by removing their warheads or taking other jointly agreed steps.

The Presidents also agreed that their experts will explore possible arms control measures relating to nuclear long-range sea-launched cruise missiles and tactical nuclear systems, and will consider issues related to transparency in nuclear materials. These discussions will take place

separate from, but in the context, of the START III negotiations. This agreement reaffirmed their statement of May 10, 1995, in which the two Presidents agreed that:

- fissile material removed from nuclear weapons being eliminated and excess to national security requirements will not be used to manufacture new nuclear weapons;

- no newly produced fissile material will be used in nuclear weapons; and

- fissile materials from or within civil nuclear programs will not be used to manufacture nuclear weapons.

In the may 1995 Joint Summit Statement the Presidents also agreed to negotiate agreements to increase transparency and irreversibility by:

- exchanging on a regular basis detailed information on aggregate stockpiles of nuclear warheads, on stocks of fissile materials and on their safety and security;

- working out a cooperative arrangement for reciprocal monitoring at storage facilities for fissile material from dismantled nuclear weapons; and

- working out other cooperative measures, as necessary, to enhance confidence in the reciprocal declarations on fissile material stockpiles.

We hope that the reaffirmation of the May 1995 Summit Statement at Helsinki last month will help break the impasse in safeguards, transparency and irreversibility negotiations that has existed since late 1995.

Finally, the two Presidents also reached agreement on how to preserve the 1972 Anti-Ballistic Missile (ABM) Treaty, the cornerstone of strategic stability that permits us to go forward not only with START I and START II reductions, but potentially down to the 2,000 - 2,500 level envisioned by the agreement on START III.

Prior to the Helsinki Summit, the United States, Russia, Belarus, Kazakstan, and Ukraine concluded, but have not yet signed, an Agreed Statement that theater missile defense (TMD) system interceptors of a velocity not exceeding 3.0 kilometers/second are deemed Treaty compliant if, during the testing of such TMD systems, the ballistic target-missile does not exceed either a maximum velocity of 5.0 km/sec or a maximum range of 3500 kilometers. (These criteria would ensure that, if this Agreed Statement enters into force, 5 of the 6 core TMD systems currently under development would be deemed ABM Treaty compliant.)

The Joint Statement signed at Helsinki provides the basis for the conclusion of three years of negotiations to demarcate between strategic ABM systems, which are covered by the Treaty, and theater missile defense, which are not. The Joint Statement reaffirms the Presidents' commitment to the ABM Treaty and the necessity of effective theater missile defenses. Specifically, the elements for the agreement on higher-velocity TMD systems reached at Helsinki are:

- during testing, the velocity of the target ballistic missiles will not exceed 5 km/sec; and
- the range of the target ballistic missiles will not exceed 3500 kilometers;
- the sides will not develop, test, or deploy space-based TMD interceptor missiles or components based on other physical principles that are capable of substituting for such interceptor missiles;
- the sides will exchange detailed information annually on TMD plans and programs.

To further help build transparency and confidence, the U.S. and Russia also announced in the Helsinki Joint Statement that neither country has plans:

- for TMD systems with interceptors exceeding a velocity of 5.5 km/sec for land-based and air- based TMD systems; or with interceptors exceeding a velocity of 4.5 km/sec for sea-based TMD systems;

- to test TMD systems against target missiles with multiple independently targetable reentry vehicles (MIRVs);

- to test TMD systems against reentry vehicles deployed or planned to be deployed on strategic ballistic missiles;

- to flight test TMD interceptor missiles in a higher-velocity TMD system against a ballistic target missile before April 1999.

The Helsinki Joint Statement itself does not constitute a legally-binding agreement on higher-velocity TMD systems (such as the Navy's "Theater-Wide" or "Upper Tier" system), but must be codified in an agreement concluded by the participants in the ABM Treaty's Standing Consultative Commission (SCC) in Geneva. An agreement regarding higher-velocity TMD systems based on the Helsinki Joint Statement would not establish any velocity limitations on TMD interceptor missiles and would not impose any moratorium or other restrictions on field-testing or deployment of such systems. Other than applying the target criteria, the U.S. and Russia will each unilaterally determine the ABM Treaty compliance of its own respective higher-velocity programs. Such an agreement will establish no legal barrier to any U.S. tests that we unilaterally certify as compliant. (The Navy's "Upper Tier" system -- potentially with a velocity exceeding 3.0 km/sec -- has been certified ABM Treaty compliant by the United States.)

To sum up, START III will provide a 30-45 percent reduction in strategic offensive weapons below START II and about an 80 percent reduction below Cold War levels, as well as

containing new measures to further enhance security, strategic stability, and irreversibility. Implementation of START II and III thus will make a major contribution toward the ultimate goal of the United States and all NPT Parties to have a world free of nuclear weapons and the threat of war. This process cannot occur overnight, however. The United States continues to hold that progress on disarmament can only be accomplished on a step-by-step basis, carefully taking into account the legitimate security concerns of all states. By doing so, we move closer to what President Clinton has called "a century in which the roles and risks of nuclear weapons can be further reduced, and ultimately eliminated."

April 21, 1997

Agenda Los Alamos National Laboratory

AMBASSADOR THOMAS GRAHAM, JR.
SPECIAL REPRESENTATIVE OF THE PRESIDENT
FOR ARMS CONTROL, NON-PROLIFERATION, AND DISARMAMENT,
U.S. ARMS CONTROL AND DISARMAMENT AGENCY
WASHINGTON, D.C.

DR. EDWARD M. IFFT
DEPUTY DIRECTOR
INTERNAL AFFAIRS, ON-SITE INSPECTION AGENCY (OSIA),
DEPARTMENT OF STATE
WASHINGTON, D.C.

April 22, 1997

REVISED

8:00 - 8:15	Meet visitors at theVisitor Center (Badge Office), and escort to the Agnew Conference Room, TA-3, SM-43, Rm. A164	Christine V. Weaver
8:15 - 8:45	Laboratory and NIS-DO Overview	Houston T. Hawkins
8:45 - 9:15	State of the Fissile Materials Cutoff Treaty (FMCT), and START III From the DC Perspective	Amb. Thomas Graham, Jr. Dr. Edward M. Ifft
9:15 - 9:45	Overview of Technical Collaborations in the Former Soviet Union and China	John W. Shaner
9:45 - 10:00	Break	

(Visit will divide, see page two for continuation of separate agendas)

Technical Host: Houston T. Hawkins, NIS-DO
Visit Planner: Christine V. Weaver, PA-4/7-9436

AMBASSADOR THOMAS GRAHAM, JR. (Cont.)

10:00 - 10:15	Escort visitor to TA-3, SM-1911, Rm. 109	Christine V. Weaver
10:15 - 11:45	Comprehensive Test Ban Treaty (CTBT) Verification	Thomas A. Weaver Brian W. Stump
11:45 - 12:00	Escort visitor to Agnew Conference Room, TA-3, SM-43, Rm. A164	Christine V. Weaver
12:00 - 1:00	Working lunch (by invitation)	
1:00 - 1:15	Escort visitor to CISA Conference Room, TA-66, Bldg. 1, Rm. A101	Christine V. Weaver
1:15 - 2:45	Future of Non-proliferation Regimes	Amb. Thomas Graham, Jr.
2:45 - 3:00	Break	
3:00 - 4:30	Roundtable discussion: Overview of NIS-NAC	James W. Tape
4:30 - 4:45	Escort visitor to private vehicle for departure	Christine V. Weaver

DR. EDWARD M. IFFT (Cont.)

10:00 - 10:20	On-Site Inspection Agency (OSIA) Issues	Dr. Edward M. Ifft
10:20 - 11:00	Roundtable discussions: • Electromagnetic Pulse Detection from Underground Tests • On-Site Inspection for the Comprehensive Test Ban Treaty (CTBT)	Dr. Edward M. Ifft John H. Wolcott Ward L. Hawkins
11:00 - 11:15	Escort visitor to TA-46, Bldg. 75	Mary Anne Yates
11:15 - 12:15	ARIES: an Integrated Pit Disassembly and Conversion System	William B. Smith
12:15 - 12:30	Escort visitor to TA-3, SM-43, Rm. C305	Mary Anne Yates
12:30 - 1:30	Working Lunch (by invitation) Roundtable discussions: Arms Control Technologies	Walter L. Kirchner Kenneth F. McKenna Roger C. Byrd Dipen N. Sinha
1:30	Escort visitor to private vehicle for departure	Mary Anne Yates

BIOGRAPHY

Ambassador Thomas Graham, Jr.

Ambassador Thomas Graham, Jr. is the Special Representative of the President for Arms Control, Non-Proliferation, and Disarmament. Ambassador Graham led U.S. Government efforts to achieve a permanent Nuclear Non-Proliferation Treaty (NPT) leading up to and during the 1995 Extension conference of the NPT. Ambassador Graham headed the U.S. Delegation to the 1996 Review Conference of the Conventional Armed Forces in Europe (CFE) Treaty. He also headed the U.S. Delegation to the 1993 ABM Treaty Review Conference as well as the last three Preparatory Committee meetings before the 1995 NPT Extension conference. In addition, he lead a number of delegations to foreign capitals in the period of 1994-1996, first to persuade countries to support indefinite extension of the NPT and in 1996 to urge conclusion of the Comprehensive Test Ban Treaty (CTBT) negotiations in Geneva, Switzerland (the CTBT was signed in September 1996). In November 1995, Ambassador Graham lead a U.S. Delegation to Indonesia to discuss with ASEAN Nations the emerging Southeast Asia Nuclear Free Zone Treaty.

Ambassador Graham was the General Counsel of the United States Arms Control and Disarmament Agency (ACDA) from 1983 to 1994. From January 20, 1993 until November 22, 1993, he served as the Acting Director of ACDA, and from November 23, 1993 to August 29, 1994 as the Acting Deputy Director. Among other assignments, he has served as the Legal Advisor to the U.S. SALT II Delegation (1974-79), the Senior Arms Control Agency Representative to the U.S. Intermediate-Range Nuclear Forces (INF) Delegation (1981-82), the Legal Advisor to the U.S. Nuclear and Space Arms Delegation (1985-88), the Senior Arms Control Agency Representative and Legal Advisor to the U.S. Delegation to the Conventional Armed Forces in Europe Negotiation (1989-90) and the Legal Advisor to the U.S. START Delegation (1991) and START II Delegation (1992). He also served as the Legal Advisor to the U.S. Delegation to the Non-Proliferation Treaty Review Conference in 1980. On numerous occasions Ambassador Graham has testified before Congressional Committees on arms control and related issues. He has taught courses at the University of Virginia School of Law, the Georgetown School of Foreign Service and the Georgetown University Law Center, has spoken widely on arms control issues around the country and abroad, and has chaired the ABA Committee on Arms Control and Disarmament.

Ambassador Graham was born in Louisville, Kentucky, and attended public high school in that city, graduating in 1951. He received his A.B. degree in 1955 from Princeton University, where his major field of study was international relations within the Woodrow Wilson School. He attended the L'Institut des Science Politiques in Paris, France from 1955 to 1956, a Harvard Summer School special program in the Arabic language in 1958 and Harvard Law School (L.L.B. 1961) from 1958-1961.

Ambassador Graham is married to Christine Coffey Ryan, and has three children and two stepchildren.

BIOGRAPHY

Dr. Edward M. Ifft

Edward Ifft is a member of the Senior Executive Service. He is currently the Deputy Director (International Affairs) for the On-Site Inspection Agency, on detail from the Department of State.

Dr. Ifft spent his early years in Butler, Pennsylvania. He received a Bachelor of Science degree in 1960 from Antioch College, where he was a General Motors Scholar. He received a Ph.D. in physics in 1967 from Ohio State University, where he was a National Science Foundation Fellow.

While a graduate student, Dr. Ifft was selected to spend a year at Moscow State University under the U.S.-USSR cultural exchange program. During this year, he carried on research in low-temperature physics at the Institute of Physical Problems of the USSR Academy of Sciences and also traveled widely throughout the Soviet Union. While a student, he also worked on antisubmarine warfare at the U.S. Naval Research Laboratory and on nuclear physics at Argonne National Laboratory.

In 1967, Dr. Ifft joined the U.S. Arms Control and Disarmament Agency. In ACDA, he worked primarily on the Strategic Arms Limitation Talks with the USSR (SALT I) and was a member of the U.S. Delegation in Helsinki and Vienna.

In 1973, Dr. Ifft moved to the State Department, where he served until 1978 as Deputy Director of the Office of Disarmament and Arms Control in the Bureau of Politico-Military Affairs. In this position, he had broad responsibilities in arms control, working primarily on SALT II and on problems related to constraints on nuclear weapons testing and peaceful nuclear explosions. He was the Deputy Chairman of the Delegation which negotiated the Threshold Test Ban Treaty in 1974 in Moscow.

In 1978, Dr. Ifft became Chief of the Office of International Program Policy in the National Aeronautics and Space Administration. His responsibilities in NASA included serving as Executive Secretary of the U.S.-USSR Space Cooperation Agreement. He also was involved in initiating cooperative space programs with China and worked extensively on UN space affairs, including serving on the U.S. Delegation to the UN Committee on the Peaceful Uses of Outer Space. He also participated in negotiating reimbursable Space Shuttle launch services with foreign governments and international organizations.

In 1981, Dr. Ifft returned to the State Department. During 1982-83, he served as the Deputy Department of State Representative and Senior Policy Advisor on the U.S. Delegation to the Strategic Arms Reductions Talks (START) in Geneva.

When negotiations with the Soviet Union on strategic arms resumed in 1985, Dr. Ifft became the Senior State Department Representative to START — a position he held until the START Treaty was signed in July, 1991. During 1988, he was the Deputy U.S. START Negotiator.

During 1994-1996, Dr. Ifft was the Senior Representative for both OSIA and the State Department on the U.S. delegation to the negotiations at the Conference on Disarmament in Geneva which produced the Comprehensive Test Ban Treaty.

In 1989, Dr. Ifft received a Senior Executive Service Meritorious Executive Award from President Bush.

Dr. Ifft has lectured on arms control and relations between the United States and the former Soviet Union at many universities and in several foreign countries, including Switzerland, Spain, The Netherlands, Norway, Turkey, the former East Germany, Romania, Russia, Kazakstan, Israel, Egypt, the United Kingdom, Australia, and New Zealand. He is the author of articles in scholarly journals published in the United States, in Russia, and by the United Nations. He is a member of the American Physical Society, the International Institute for Strategic Studies, and the American Association for the Advancement of Slavic Studies.

Dr. Ifft is married and has two children. He resides in Falls Church, Virginia.