

LETTER OF TRANSMITTAL

SPACE TREATY PROPOSALS BY THE
UNITED STATES AND U.S.S.R.

Hon. CLINTON L. ANDERSON
Chairman, Committee on Aeronautical and Space Sciences,
U.S. Senate, Washington, D.C.

DEAR MR. CHAIRMAN: The purpose of this committee print on
"Space Treaty Proposals by the United States and U.S.S.R." is to
present to the Senate in connection with the ratification of the
draft treaty upon which the 28 members could be considered for
report to the United Nations General Assembly for consideration
during its 21st session.

STAFF REPORT
PREPARED FOR THE USE OF THE
COMMITTEE ON AERONAUTICAL AND
SPACE SCIENCES
UNITED STATES SENATE

This study has been prepared by Mrs. Eilene Galloway, special
consultant to the committee, and reviewed by Mr. Everard H. Smith,
Jr., and other members of the committee's professional staff.

The study was prepared by Mrs. Eilene Galloway, special
consultant to the committee, and reviewed by Mr. Everard H. Smith,
Jr., and other members of the committee's professional staff.



JULY 1966

The study was prepared by Mrs. Eilene Galloway, special
consultant to the committee, and reviewed by Mr. Everard H. Smith,
Jr., and other members of the committee's professional staff.

JAMES J. GERRIG,
Staff Director.

Printed for the use of the Committee on Aeronautical and Space Sciences

U.S. GOVERNMENT PRINTING OFFICE

65-822

WASHINGTON : 1966

SPACE TREATY PROPOSALS BY THE
UNITED STATES AND U.S.S.R.

SENATE COMMITTEE ON AERONAUTICAL AND SPACE SCIENCES

CLINTON P. ANDERSON, New Mexico, *Chairman*

RICHARD B. RUSSELL, Georgia
WARREN G. MAGNUSON, Washington
STUART SYMINGTON, Missouri
JOHN STENNIS, Mississippi
STEPHEN M. YOUNG, Ohio
THOMAS J. DODD, Connecticut
HOWARD W. CANNON, Nevada
SPESSARD L. HOLLAND, Florida
WALTER F. MONDALE, Minnesota
HARRY F. BYRD, Jr., Virginia

MARGARET CHASE SMITH, Maine
BOURKE B. HICKENLOOPER, Iowa
CARL T. CURTIS, Nebraska
LEN B. JORDAN, Idaho
GEORGE D. AIKEN, Vermont

JAMES J. GEHRIG, *Staff Director*

EVERARD H. SMITH, Jr., *Professional Staff Member*

WILLIAM J. DEACHMAN, *Professional Staff Member*

Dr. GLEN P. WILSON, *Professional Staff Member*

CRAIG VOORHEES, *Professional Staff Member*

DONALD H. BRENNAN, *Research Assistant*

SAM BOUCHARD, *Assistant Chief Clerk*

EILENE GALLOWAY, *Special Consultant*

ii

JULY 1968

Printed for the use of the Committee on Aeronautical and Space Sciences

U.S. GOVERNMENT PRINTING OFFICE

WASHINGTON : 1968

65-502

LETTER OF TRANSMITTAL

U.S. SENATE,
COMMITTEE ON AERONAUTICAL AND SPACE SCIENCES,
July 26, 1966.

HON. CLINTON P. ANDERSON,
Chairman, Committee on Aeronautical and Space Sciences,
U.S. Senate, Washington, D.C.

DEAR MR. CHAIRMAN: The purpose of this committee print on "Space Treaty Proposals by the United States and U.S.S.R." is to make available information on a subject which is of interest to the Senate in connection with its responsibility for advice and consent to the ratification of treaties.

It is timely to publish the background documents and a comparison of the United States and Soviet proposals for an outer space treaty on the moon and other celestial bodies during the period when the provisions are being negotiated. On July 12, 1966, in Geneva, the Legal Subcommittee of the United Nations Committee on the Peaceful Uses of Outer Space began its meetings to consider provisions for a final draft treaty upon which the 28 members could come to an agreement and report to the United Nations General Assembly for consideration during its 21st session in the fall of 1966.

This study has been undertaken in accordance with the Standing Rules of the Senate which provide that this committee "shall have jurisdiction to survey and review, and to prepare studies and reports upon, aeronautical and space activities of all agencies of the United States, including such activities which are peculiar to or primarily associated with the development of weapons systems or military operations." In this case, the proposed space treaty is primarily within those space activities for which executive responsibility is in the Department of State, National Aeronautics and Space Administration, and the Department of Defense.

The study was prepared by Mrs. Eilene Galloway, special consultant to the committee, and reviewed by Mr. Everard H. Smith, Jr., and other members of the committee's professional staff.

Sincerely yours,

JAMES J. GEHRIG,
Staff Director.

SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.S.R.

INTRODUCTION

On May 7, 1966, President Johnson proposed a treaty on the exploration of the moon and other celestial bodies. His statement was read by the White House Deputy Press Secretary to news correspondents in San Antonio, Texas.

CONTENTS

| | Page |
|---|------|
| Introduction..... | 1 |
| U.S. draft treaty governing the exploration of the moon and other celestial bodies..... | 9 |
| U.S.S.R. draft treaty on principles governing the activities of states in the exploration and use of outer space, the moon, and other celestial bodies..... | 12 |
| Comparison of United States and U.S.S.R. draft treaties..... | 16 |
| Background documents: | |
| United Nations Resolution 1962 (XVIII) December 13, 1963..... | 27 |
| United Nations Resolution 1963 (XVIII) December 13, 1963..... | 29 |
| United Nations Resolution 1884 (XVIII) October 17, 1963..... | 32 |
| Treaty banning nuclear weapon tests in the atmosphere, in outer space, and under water, 1963..... | 33 |
| The Antarctic Treaty, 1960..... | 39 |
| United Nations Resolution 2130 (XX) December 21, 1965..... | 46 |
| Moon exploration: | |
| United States record..... | 48 |
| U.S.S.R. record..... | 50 |
| Members of the United Nations Committee on the Peaceful Uses of Outer Space..... | 52 |
| List of previous publications on international space activities by the Committee on Aeronautical and Space Sciences..... | 52 |

"I am convinced that we should do what we can--not only for our generation, but for future generations--to see to it that serious political conflicts do not arise as a result of space activities. I believe that the time is ripe for action. We should not lose time.

"I am asking Ambassador Goldberg, in New York, to seek early discussions of such a treaty in the appropriate United Nations body."

Two days later, the United States Ambassador to the United Nations, Arthur J. Goldberg, sent the following letter to Honorable Kurt Waldheim, Chairman of the United Nations Committee on the Peaceful Uses of Outer Space:

LETTER FROM AMBASSADOR GOLDBERG

U.S./U.N. press release 4561.

MAY 9, 1966.

EXCELLENCY: I have the honor to bring to your attention the following announcement by President Johnson on the need for a

¹ Department of State Bulletin, June 6, 1966, p. 803.

SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.S.R.

INTRODUCTION

On May 7, 1966, President Johnson proposed a treaty on the exploration of the moon and other celestial bodies. His statement was read by the White House Deputy Press Secretary to news correspondents in San Antonio, Texas, as follows:

"Just as the United States is striving to help achieve peace on earth, we want to do what we can to insure that explorations of the moon and other celestial bodies will be for peaceful purposes only. We want to be sure that our astronauts and those of other nations can freely conduct scientific investigations of the moon. We want the results of these activities to be available for all mankind.

"We want to take action now to attain these goals. In my view, we need a treaty laying down rules and procedures for the exploration of celestial bodies. The essential elements of such a treaty would be as follows:

"The moon and other celestial bodies should be free for exploration and use by all countries. No country should be permitted to advance a claim of sovereignty.

"There should be freedom of scientific investigation, and all countries should cooperate in scientific activities relating to celestial bodies.

"Studies should be made to avoid harmful contamination.

"Astronauts of one country should give any necessary help to astronauts of another country.

"No country should be permitted to station weapons of mass destruction on a celestial body. Weapons tests and military maneuvers should be forbidden.

"I am convinced that we should do what we can—not only for our generation, but for future generations—to see to it that serious political conflicts do not arise as a result of space activities. I believe that the time is ripe for action. We should not lose time.

"I am asking Ambassador Goldberg, in New York, to seek early discussions of such a treaty in the appropriate United Nations body."

Two days later, the United States Ambassador to the United Nations, Arthur J. Goldberg, sent the following letter to Honorable Kurt Waldheim, Chairman of the United Nations Committee on the Peaceful Uses of Outer Space:

LETTER FROM AMBASSADOR GOLDBERG

U.S./U.N. press release 4851.

MAY 9, 1966.

EXCELLENCY: I have the honor to bring to your attention the following announcement by President Johnson on the need for a

¹ Department of State Bulletin, June 6, 1966, p. 900.

2 SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.S.R.

treaty governing the exploration of the moon and other celestial bodies:

[Text of President Johnson's statement of May 7 as quoted above]

This proposal of my Government is based on our long-standing concern with the peaceful uses of outer space. You may recall that over seven years ago the United States inscribed the first item to appear on the General Assembly's agenda concerning the peaceful uses of outer space and introduced a draft resolution¹ sponsored by 20 States. This became the first outer space action taken by the Assembly. It was introduced in the First Committee by the then Majority Leader of the United States Senate, Senator Lyndon B. Johnson of Texas.²

Action since that time has been heartening to all of those who believe in the role of the United Nations as a source of international law and peaceful development. Resolution 1721,³ of December 20, 1961, set forth the essential legal principles applicable to outer space in an enlightened fashion that has no precedent in any previous age of exploration. One of these principles was that international law, including the Charter of the United Nations, applies to outer space. Another principle is that outer space and celestial bodies are free for exploration and use by all States in conformity with international law, and are not subject to national appropriation. Building on this foundation, Resolution 1962,⁴ approved by the Assembly on December 13, 1963, set forth a number of additional points that will be remembered gratefully centuries from now.

Our current proposal for a treaty is designed to be another great step forward in the cooperative development of outer space for peaceful uses. Because of its significance and urgency, I would greatly appreciate your taking the necessary steps for an early convening of the Legal Subcommittee of the Committee on Outer Space.

I should like to take this occasion, Excellency, to express our continued appreciation for the admirable way in which you have presided over the work of this most important Committee and to assure you of our continued desire to extend the utmost cooperation in this field which is so important to the future of mankind.

ARTHUR J. GOLDBERG.⁵

On May 30, 1966, the Permanent Representative of the Union of Soviet Socialist Republics to the United Nations, N. Fedorenko, sent to the Secretary-General of the United Nations a letter from A. A. Gromyko, Minister for Foreign Affairs of the U.S.S.R., as follows:

¹ For text, see Department of State Bulletin, Jan. 5, 1959, p. 32.

² Ibid., Dec. 15, 1958, p. 977.

³ For text, see ibid., Jan. 29, 1962, p. 185.

⁴ For text, see ibid., Dec. 30, 1963, p. 1005.

⁵ Department of State Bulletin, June 6, 1966, pp. 900-901.

UNITED NATIONS GENERAL ASSEMBLY,
Twenty-first session.

REQUEST FOR THE INCLUSION OF AN ITEM IN THE PROVISIONAL AGENDA
OF THE 21ST SESSION

CONCLUSION OF AN INTERNATIONAL AGREEMENT ON LEGAL PRINCIPLES
GOVERNING THE ACTIVITIES OF STATES IN THE EXPLORATION AND
CONQUEST OF THE MOON AND OTHER CELESTIAL BODIES

*Letter dated May 30, 1966, from the Permanent Representative of the
Union of Soviet Socialist Republics to the United Nations addressed
to the Secretary-General*

I have the honor to enclose herewith a letter from A. A. Gromyko, Minister for Foreign Affairs of the U.S.S.R., containing a request for the inclusion in the agenda of the twenty-first session of the United Nations General Assembly, as a separate and important question, of the item "Conclusion of an international agreement on legal principles governing the activities of States in the exploration and conquest of the moon and other celestial bodies".

I should be glad if you would arrange to have the attached letter circulated as an official document of the United Nations.

(Signed) N. FEDORENKO.

SIR: On the instructions of the Government of the Union of Soviet Socialist Republics I request the inclusion in the agenda of the twenty-first session of the United Nations General Assembly, as a separate and important question, of the item "Conclusion of an international agreement on legal principles governing the activities of States in the exploration and conquest of the moon and other celestial bodies".

As you know, great new scientific and technological successes have been achieved this year in the exploration of the moon.

The Soviet Union successfully launched the automatic station "Luna-9", which for the first time in history made a soft landing on the earth's natural satellite. The Soviet automatic station "Luna-10" was for the first time successfully placed in a circumlunar orbit and became an artificial satellite of the moon. With these scientific experiments a further significant advance was made in man's exploration and conquest of the moon and of the other planets of the solar system. The flights of the "Luna-9" and "Luna-10" stations opened a new era in the exploration of space and convincingly demonstrated the real possibility of man's conquest of the moon in the very near future—a feat which will undoubtedly be the outstanding event of our century.

It is still difficult at the present time to enumerate all the spheres of human knowledge which will be further developed through the exploration of the moon and other celestial bodies. But there is no doubt that this exploration will enrich mankind with new data on the secret laws of nature.

The conquest of the moon and other celestial bodies, however, raises not only technical and scientific problems but also the question in what direction and on what basis States will conduct their activ-

ities in this sphere. This is a question of exceptional importance for all States.

The Soviet programme for the exploration of the moon and other celestial bodies is designed exclusively to serve science. The Soviet Government considers that the conquest of the moon and other celestial bodies should be carried out in the interests of peace and progress exclusively, for the benefit of all mankind. No one State has the right to regard its achievements in this sphere as a basis for claims to dominion over the moon and other celestial bodies or to use those achievements for activities directed against other States.

In the Soviet Government's view, it has now become essential to begin the formulation of rules of international law in accordance with which States would take practical measures for the conquest of the moon and other celestial bodies, and above all to take steps to prohibit the use of the moon and other celestial bodies for military purposes.

It is quite obvious that plans for the military use of the moon and other celestial bodies cannot in any way be justified by reference to the national security interests of States and are intended merely to serve the purposes of aggression, the purposes of preparing for global war.

The Soviet Union, as is known, is consistently working for the conclusion of an agreement on general and complete disarmament, for the limitation of the armaments race and the relaxation of international tension. To prohibit the use of the moon and other celestial bodies for military purposes would be a major step in that direction, and would be calculated to ensure peace on earth and the security of peoples. At the same time, the prohibition of any military use of the moon and other celestial bodies and the establishment of a solid foundation of international law on which States would carry out practical measures for their conquest would help to promote broad international co-operation in various aspects of the exploration and use of the moon and other celestial bodies, and thereby foster mutual understanding and strengthen friendly relations among States and peoples.

The conquest of the moon will proceed the faster the more countries make their contribution to the necessary investigations and experiments. That means that equal opportunities should be opened to all States. In taking advantage of these opportunities, States should conduct their activities with due regard for the relevant interests of other States. Co-operation of this kind has consistently been advocated by the Soviet Union, which has always regarded and still regards its successes in space exploration as achievements not of the Soviet people alone but of all mankind as well.

As early as 1958 the Soviet Government proposed the conclusion of an international agreement providing for co-operation in the exploration and peaceful use of outer space, and referred the question to the United Nations for its consideration. In 1961, after the first manned space flight, the Soviet Union again took steps designed to establish and develop co-operation with other countries in the conquest of space.

On the basis of the U.S.S.R.'s proposals, the United Nations in 1963 adopted a declaration of legal principles governing the activities of States in the exploration and use of outer space. Thanks to the Soviet Union's efforts, a resolution was adopted calling on all States to refrain from placing in orbit around the earth any objects carrying nuclear weapons or any other kinds of weapons of mass destruction or installing such weapons on celestial bodies.

The Government of the Soviet Union, desiring to place the achievements of science and technology in the conquest of the moon and other celestial bodies at the service of peace and progress and to make it possible for all States to benefit by the practical results of research and make their own contributions to such research, proposes the conclusion of an international agreement, which could be based on the following principles governing the activities of States in the exploration and conquest of the moon and other celestial bodies:

1. The moon and other celestial bodies should be open for exploration and use by all States, without discrimination of any kind. All States enjoy freedom of scientific research in regard to the moon and other celestial bodies on equal terms and in accordance with the fundamental principles of international law.

2. The moon and other celestial bodies should be used by all States exclusively for peaceful purposes. No military bases or installations of any kind, including facilities for nuclear and other weapons of mass destruction of any type, should be established on the moon or other celestial bodies.

3. The exploration and use of the moon and other celestial bodies shall be carried on for the good and in the interest of all mankind; the moon and other celestial bodies shall not be subject to appropriation or territorial claims of any kind.

4. In the exploration of the moon and other celestial bodies, States shall be guided by the principles of co-operation and mutual aid and shall carry out their activities with due regard for the relevant interests of other States and with a view to the maintenance of international peace and security.

An agreement based on principles of that kind would ensure the necessary climate for the peaceful exploration and conquest of the moon, would prevent any possibility of this sphere of human activity being made a source of international dissension, and would create favourable conditions for the future concretization of the international legal aspects of State activities relating to the conquest of other celestial bodies.

The Government of the Union of Soviet Socialist Republics counts on the General Assembly to give due attention at its twenty-first session to the question of the "Conclusion of an international agreement on legal principles governing the activities of States in the exploration and conquest of the moon and other celestial bodies".

I should be glad if you would regard this letter as an explanatory memorandum as provided in rule 20 of the rules of procedure of the General Assembly, and circulate it as an official United Nations document.

Accept, Sir, etc.

(Signed) A. GROMYKO,
Minister for Foreign Affairs of the
Union of Soviet Socialist Republics.¹

The next steps toward negotiations for an outer space treaty on the moon and other celestial bodies were taken on June 16, 1966. On that date United States Ambassador Goldberg sent a letter to Honorable Kurt Waldheim, Chairman of the United Nations Committee on the Peaceful Uses of Outer Space, together with the text of the U.S. draft

¹ United Nations document A/6341, May 31, 1966.

treaty. On the same day, the Acting Permanent Representative of the U.S.S.R. to the United Nations, P. Morozov, sent a letter and the text of a draft treaty to the Secretary-General of the United Nations. The texts of the two letters are quoted below and the draft treaties appear on pages 9-15.

LETTER FROM AMBASSADOR GOLDBERG TO THE CHAIRMAN OF THE
UNITED NATIONS COMMITTEE ON THE PEACEFUL USES OF OUTER
SPACE

JUNE 16, 1966.

EXCELLENCY: On 9 May I informed you of the statement by President Johnson of 7 May in which he proposed early discussion of a treaty governing the exploration of the moon and other celestial bodies.

The purpose of my letter was to request an early convening of the Outer Space Legal Subcommittee to prepare a draft treaty for submission to the General Assembly at the next session.

Shortly after that request, we consulted with members of the Outer Space Committee to give them our views in some detail on the twelve points which we believed should be included in a celestial bodies treaty.

One of the first to be consulted was the Soviet Mission, on whose Permanent Representative I called on 11 May. At that time I gave him a written outline as follows:

OUTLINE OF POINTS FOR INCLUSION IN CELESTIAL BODIES TREATY

1. The Moon and other celestial bodies should be free for exploration by all in accordance with international law.
2. Celestial bodies should not be subject to any claim of sovereignty.
3. There should be freedom of scientific investigation, and all countries should cooperate in scientific activities relating to celestial bodies.
4. A state conducting explorations on a celestial body should report on the results of a mission.
5. Open access to all areas of celestial bodies should be assured.
6. Celestial bodies should be used for peaceful purposes only. No country should be permitted to station weapons of mass destruction on a celestial body. Military fortifications, weapons tests, and military maneuvers should be forbidden.
7. A launching state should be entitled to exercise authority over its facilities on a celestial body and persons participating in its activities there.
8. Ownership of objects landed, constructed or used on a celestial body should be retained by the launching state.
9. Astronauts of one country should render assistance to other astronauts as may be required by circumstances.
10. States should pursue studies and take appropriate steps to avoid harmful contamination.
11. Consideration should be given to a provision for the settlement of any disputes that might arise.
12. Final clauses—there should be appropriate provisions on signature, ratification, depositary, entry into force, amendment, duration, and registration with the United Nations.

In the course of our consultations with the Committee's membership we made clear our desire to make early progress on this subject as well as on the other international agreements which the General Assembly asked the Committee to prepare in resolution 2130 (XX).

In response to the U.S. request, you were good enough, on 18 May, to consult the Committee's membership with regard to an early meeting. I understand that thus far none of those who have replied have opposed an early session; in fact there is, I believe, considerable support for the idea of using the time between now and the General Assembly to prepare a draft treaty which could be presented to the Assembly this Fall.

We have been encouraged by the substantial area of apparent agreement between the points we had proposed for inclusion in a treaty, and the letter of the Minister for Foreign Affairs of the U.S.S.R. which was circulated as a UN document on 30 May. My Government then made known its welcome of what appeared to be an affirmative interest in President Johnson's proposal and again expressed the wish that maximum progress be made without further delay in the hope that the Assembly could give its approval to a completed text at its 21st session.

In order to take advantage of the favorable response to President Johnson's proposal, I have the honor herewith to present the attached draft "Treaty Governing the Exploration of the Moon and other Celestial Bodies" and request that it be circulated as a UN document. Further, I have the honor to propose that the Outer Space Legal Sub-Committee be convened on 12 July so that work on this important subject be gotten underway at the earliest time.

The speed with which men's actual progress in outer space is being recorded requires that we allow no delay in assuring the prompt extension of international law and the United Nations Charter.

ARTHUR J. GOLDBERG.¹

LETTER DATED JUNE 16, 1966, FROM THE PERMANENT REPRESENTATIVE OF THE UNION OF SOVIET SOCIALIST REPUBLICS TO THE UNITED NATIONS ADDRESSED TO THE SECRETARY-GENERAL (UNITED NATIONS GENERAL ASSEMBLY, 21ST SESSION)²

SIR: On the instructions of the Government of the Union of Soviet Socialist Republics, I have the honour to transmit herewith a draft Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, the Moon and other Celestial Bodies. The Soviet Government is submitting this draft Treaty for consideration at the twenty-first session of the General Assembly under the agenda item proposed for that session by the Soviet Union.

I should be grateful if you would have the aforementioned draft Treaty circulated to all delegations as an official United Nations document.

(Signed) P. MOROZOV,
Acting Permanent Representative of the U.S.S.R. to the
United Nations.

¹ Department of State Bulletin, July 11, 1966, pp. 60-62.

² United Nations Document A/6352, June 16, 1966. 6p.

The negotiation of an outer space treaty is the latest in a series of steps taken in accordance with the continuing policy of the United States to reduce international tensions and insure world peace. It will be recalled that in 1963 when the Nuclear Test Ban Treaty was before the Senate, the Senate Foreign Relations Committee reported that:

The limited test ban is an American proposal. Its substance was first offered by President Eisenhower, who, with British support, proposed in a letter to Chairman Khrushchev on April 13, 1959, a prohibition on atmospheric tests up to 50 kilometers. On-site inspections would not have been required. Mr. Khrushchev rejected the President's proposal on the ground that it would not attain the basic goal of "preventing the production of new and ever more destructive types of nuclear weapons." The Soviet Government held this position until July 1963 when it agreed to the three-environment treaty before the Senate.³

Subsequent negotiation led to the successful conclusion of the Treaty Banning Nuclear Weapon Tests in the Atmosphere, in Outer Space, and Under Water. (See pp. 33-38.)

Beginning with its contribution to the United Nations Ad Hoc Committee on the Peaceful Uses of Outer Space (established as a result of passage by the General Assembly of Resolution 1348 (XIII), Dec. 13, 1958), the United States has consistently formulated and sought the adoption of principles to guide states in the peaceful uses and exploration of outer space. The constructive role played by the United States in drafting and supporting the two United Nations outer space resolutions which passed the General Assembly unanimously on December 13, 1963, is part of the historic record. U.S. Ambassador Adlai Stevenson said "We believe these legal principles reflect international law as it is accepted by the members of the United Nations. The United States, for its part, intends to respect these principles. We hope that the conduct which the resolution commends to nations in the exploration of outer space will become the practice of all nations." The Soviet representative, Mr. Fedorenko, replied that "The Soviet Union, for its part, will also respect the principles contained in this declaration if it is unanimously adopted."⁴

President Johnson, who spoke on the peaceful uses of outer space at the United Nations on November 17, 1958 when he was majority leader of the Senate, set in motion the current negotiations for a space treaty by his statement of May 7, 1966. The Legal Subcommittee of the United Nations Committee on the Peaceful Uses of Outer Space began its discussions of legal principles for a space treaty in Geneva, Switzerland, on July 12, 1966.

³ The Nuclear Test Ban Treaty, Senate Foreign Relations Committee, Executive Report No. 3. 88th Cong., 1st sess. Sept. 3, 1963, p. 2.

⁴ International Cooperation and Organization for Outer Space, Senate Committee on Aeronautical and Space Sciences, S. Doc. No. 56, 89th Cong., 1st sess., 1965. Pp. 235-236, 237.

ARTICLE 6

UNITED STATES DRAFT TREATY GOVERNING THE EXPLORATION OF THE MOON AND OTHER CELESTIAL BODIES

The Contracting Parties,

Recalling General Assembly resolution 1962 (XVIII), entitled "Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space", adopted unanimously by the General Assembly on 13 December 1963,

Further recalling General Assembly resolution 1884 (XVIII), concerning weapons of mass destruction, adopted by acclamation on 17 October 1963,

Recognizing that it is in the interest of all mankind that celestial bodies should be used for peaceful purposes only,

Anticipating the substantial contributions to scientific knowledge which will flow from international cooperation in the scientific investigation of celestial bodies,

Convinced that a treaty on the use of celestial bodies will further the Purposes and Principles of the Charter of the United Nations,

Agree that:

ARTICLE 1

Celestial bodies are free for exploration and use by all States on a basis of equality and in accordance with international law. They are not subject to national appropriation by claim of sovereignty by means of use or occupation or by other means.

ARTICLE 2

There shall be freedom of scientific investigation on celestial bodies.

ARTICLE 3

States shall facilitate and encourage international cooperation in scientific investigations concerning celestial bodies.

ARTICLE 4

A State conducting activities on a celestial body shall (a) promptly provide the Secretary General of the United Nations with a descriptive report of the nature, conduct, and locations of such activities and (b) make the findings of such activities freely available to the public and the international scientific community.

ARTICLE 5

States in a position to do so shall, where requested or required by the circumstances, render assistance to nationals of other States engaged in activities on celestial bodies.

10 SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.S.R.

ARTICLE 6

All areas of celestial bodies, including all stations, installations, equipment, and space vehicles on celestial bodies, shall be open at all times to representatives of other States conducting activities on celestial bodies.

ARTICLE 7

A State may exercise authority over its facilities and persons participating in its activities on a celestial body. Ownership of objects shall not be affected by their being landed, constructed or used on a celestial body.

ARTICLE 8

In accordance with the sense of General Assembly resolution 1884 (XVIII), adopted by acclamation on October 17, 1963, no State shall station on or near a celestial body any nuclear weapons or other weapons of mass destruction.

ARTICLE 9

Celestial bodies shall be used for peaceful purposes only. All States undertake to refrain from conducting on celestial bodies any activities such as the establishment of military fortifications, the carrying out of military maneuvers, or the testing of any type of weapons. The use of military personnel, facilities or equipment for scientific research or for any other peaceful purpose shall not be prohibited.

ARTICLE 10

States shall pursue studies of and, as appropriate, take steps to avoid harmful contamination of celestial bodies and adverse changes in the environment of the Earth resulting from the return of extraterrestrial matter.

ARTICLE 11

Any disputes arising from the interpretation or application of this Agreement may be referred by any Contracting Party thereto to the International Court of Justice for decision.

ARTICLE 12

This Agreement shall be open for signature by States Members of the United Nations or of any of the specialized agencies or Parties to the Statute of the International Court of Justice, and by any other State invited by the General Assembly of the United Nations to become a party. Any such State which does not sign this Agreement may accede to it at any time.

ARTICLE 13

This Agreement shall be subject to ratification or approval by signatory States. Instruments of ratification or approval and instruments of accession shall be deposited with the Secretary-General of the United Nations.

ARTICLE 14

This Agreement shall enter into force upon the deposit of the second instrument of ratification, approval, or accession. It shall enter into force as to a State ratifying, approving, or acceding thereafter upon the deposit of its instrument of ratification, approval, or accession.

ARTICLE 15

A Contracting Party may propose amendments to this Agreement. Amendments shall come into force for each Contracting Party accepting the amendments on acceptance by a majority of the Contracting Parties and thereafter for each remaining Contracting Party on acceptance by it.

ARTICLE 16

A Contracting Party may give notice of its withdrawal from this Agreement one year after its entry into force by written notification to the Secretary-General of the United Nations. Such withdrawal shall take effect one year from the date of receipt by the Secretary-General of the notification.

ARTICLE 17

The Secretary-General of the United Nations shall inform all States referred to in Article 12 of signatures, deposits of instruments of ratification, approval, or accession, the date of entry into force of this Agreement, proposals for amendment, notification of acceptances of amendments, and notices of withdrawal.

ARTICLE 18

This Agreement shall be registered in accordance with Article 102 of the Charter of the United Nations.

ARTICLE 19

The original of this Agreement, of which the Chinese, English, French, Russian and Spanish texts are equally authentic, shall be deposited with the Secretary-General of the United Nations who shall send certified copies thereof to the States referred to in Article 12.

IN WITNESS WHEREOF, the undersigned, being duly authorized, have signed this Agreement.

DONE at _____, this _____ day of _____, 196...

JUNE 16, 1966.

U.S.S.R. DRAFT TREATY ON PRINCIPLES GOVERNING THE ACTIVITIES OF STATES IN THE EXPLORATION AND USE OF OUTER SPACE, THE MOON, AND OTHER CELESTIAL BODIES

The Governments-----, hereinafter referred to as the Parties to the Treaty,

Inspired by the great prospects opening up before mankind as a result of man's entry into outer space,

Recognizing the common interest of all mankind in the progress of the exploration and use of outer space for peaceful purposes,

Believing that the exploration and use of outer space should be carried on for the benefit of all peoples irrespective of the degree of their economic or scientific development,

Desiring to contribute to broad international co-operation in the scientific as well as the legal aspects of the exploration and use of outer space for peaceful purposes,

Believing that such co-operation will contribute to the development of mutual understanding and to the strengthening of friendly relations between States and peoples,

Taking account of General Assembly resolution 110 (II) of 3 November 1947, which condemned propaganda designed or likely to provoke or encourage any threat to the peace, breach of the peace or act of aggression, and considering that the aforementioned resolution is applicable to outer space,

Have agreed on the following:

ARTICLE I

The exploration and use of outer space shall be carried out for the benefit and in the interests of all countries and shall be the province of all mankind. The Parties to the Treaty undertake to accord equal conditions to States engaged in the exploration of outer space.

Outer space, including the moon and other celestial bodies, shall be free for exploration and use by all States without discrimination of any kind, on a basis of equality and in accordance with international law, and there shall be free access to all regions of celestial bodies.

ARTICLE II

Outer space and celestial bodies shall not be subject to national appropriation by claim of sovereignty, by means of use or occupation, or by any other means.

ARTICLE III

The Parties to the Treaty shall carry on activities in the exploration and use of outer space, including the moon and other celestial bodies, in accordance with international law, including the Charter of the United Nations, in the interest of maintaining international peace

and security and promoting international co-operation and understanding.

ARTICLE IV

The Parties to the Treaty undertake not to place in orbit around the earth any objects carrying nuclear weapons or other weapons of mass destruction and not to station such weapons on celestial bodies or otherwise to station them in outer space. The moon and other celestial bodies shall be used exclusively for peaceful purposes by all Parties to the Treaty. The establishment of military bases and installations, the testing of weapons and the conduct of military manoeuvres on celestial bodies shall be forbidden.

ARTICLE V

A State Party to the Treaty on whose registry an object launched into outer space is carried shall retain jurisdiction and control over such objects, and over any personnel thereon, while it is in outer space or on a celestial body. Ownership of objects launched into outer space, including objects delivered to or constructed on a celestial body, and of their component parts, shall not be affected by their presence in outer space or on a celestial body or by their return to earth. Such objects or component parts found beyond the limits of the State Party to the Treaty on whose registry they are carried shall be returned to that State, which shall, upon request, furnish identifying data prior to their return.

ARTICLE VI

The Parties to the Treaty shall bear international responsibility for national activities in outer space or on celestial bodies, whether such activities are carried on by governmental agencies or by non-governmental bodies corporate. The activities of non-governmental bodies corporate in outer space shall require authorization and continuing supervision by the State concerned. When activities are carried on in outer space by an international organization, responsibility for compliance with this Treaty shall be borne both by the international organization and by the States Parties to the Treaty participating in such organization.

ARTICLE VII

Each State Party to the Treaty which launches or organizes the launching of an object into outer space and on to celestial bodies, and State from whose territory or facility an object is launched, is internationally liable for damage to another State Party to the Treaty or to its natural or juridical persons by such object or its component parts on the earth, in air space, in outer space or on the celestial body.

ARTICLE VIII

In the exploration and use of outer space, States Parties to the Treaty shall be guided by the principle of co-operation and mutual assistance and shall conduct all their activities in outer space, including activities on celestial bodies, with due regard for the corresponding

interests of other States. States Parties to the Treaty shall conduct research on celestial bodies in such a manner as to avoid harmful contamination. If a State Party to the Treaty has reason to believe that an outer space activity or experiment planned by it or its nationals would cause potentially harmful interference with activities of other States Parties in the peaceful exploration and use of outer space, including activities on celestial bodies, it shall undertake appropriate international consultations before proceeding with any such activity or experiment. A State Party to the Treaty which has reason to believe that an outer space activity or experiment planned by another State Party would cause potentially harmful interference with activities in the peaceful exploration and use of outer space, including activities on celestial bodies, may request consultation concerning the activity or experiment.

ARTICLE IX

States Parties to the Treaty shall regard astronauts as envoys of mankind in outer space, and shall render to them all possible assistance in the event of accident, distress, or emergency landing on the territory of another State Party or on the high seas. Where astronauts make such a landing, their safety shall be assured and they shall be enabled promptly to return to the territory of the State Party of registry of their space vehicle.

In carrying on activities in outer space and on celestial bodies, the astronauts of one State Party shall render all possible assistance to the astronauts of other States Parties.

ARTICLE X

In the event of disputes arising in connexion with the application or interpretation of the Treaty, the States Parties concerned shall immediately consult together with a view to their settlement.

ARTICLE XI

1. This Treaty shall be open to all States for signature. Any State which does not sign this Treaty before its entry into force in accordance with paragraph 3 of this article may accede to it at any time.

2. This Treaty shall be subject to ratification by signatory States. Instruments of ratification and instruments of accession shall be deposited with the Governments of-----, which are hereby designated the Depositary Governments.

3. This Treaty shall enter into force after its ratification-----.

4. For States whose instruments of ratification or accession are deposited subsequent to the entry into force of this Treaty, it shall enter into force on the date of the deposit of their instruments of ratification or accession.

5. The Depositary Governments shall promptly inform all signatory and acceding States of the date of each signature, the date of deposit of each instrument of ratification of and accession to this Treaty, the date of its entry into force, and other notices.

6. This Treaty shall be registered by the Depositary Governments pursuant to Article 102 of the Charter of the United Nations.

UNITED STATES AND U.S.S.R. DRAFT TREATIES ON THE MOON AND OTHER CELESTIAL BODIES—A COMPARATIVE ANALYSIS

By Eilene Galloway

UNITED STATES DRAFT TREATY GOVERNING THE EXPLORATION OF THE MOON AND OTHER CELESTIAL BODIES

(June 16, 1966)

The Contracting Parties,
Recalling General Assembly resolution 1962 (XVIII), entitled "Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space," adopted unanimously by the General Assembly on 13 December 1963,

Further recalling General Assembly resolution 1884 (XVIII), concerning weapons of mass destruction, adopted by acclamation on 17 October 1963,

Recognizing that it is in the interest of all mankind that celestial bodies should be used for peaceful purposes only,

Anticipating the substantial contributions to scientific knowledge which will flow from international cooperation in the scientific investigation of celestial bodies,

Convinced that a treaty on the use of celestial bodies will further the Purposes and Principles of the Charter of the United Nations,

Agree that:

U.S.S.R. DRAFT TREATY ON PRINCIPLES GOVERNING THE ACTIVITIES OF STATES IN THE EXPLORATION AND USE OF OUTER SPACE, THE MOON, AND OTHER CELESTIAL BODIES

(June 16, 1966)

The Governments . . . , hereinafter referred to as the Parties to the Treaty,
Inspired by the great prospects opening up before mankind as a result of man's entry into outer space,

Recognizing the common interest of all mankind in the progress of the exploration and use of outer space for peaceful purposes,

Believing that the exploration and use of outer space should be carried on for the benefit of all peoples irrespective of the degree of their economic or scientific development,

Desiring to contribute to broad international co-operation in the scientific as well as the legal aspects of the exploration and use of outer space for peaceful purposes,

Believing that such co-operation will contribute to the development of mutual understanding and to the strengthening of friendly relations between States and peoples,

Taking account of General Assembly resolution 110 (II) of 3 November 1947, which condemned propaganda designed or likely to provoke or encourage any threat

ANALYSIS

There are striking similarities between the United States and Soviet Union draft treaties, the chief difference being revealed in their titles. The United States draft concerns the moon and other celestial bodies; the Soviet draft covers the moon, other celestial bodies and outer space.

The similarities in the two drafts result from the fact that both nations relied upon resolutions which had already passed the United Nations unanimously, as well as upon some points contained in two other international agreements pending on the agenda of the Legal Subcommittee of the U.N. Committee on the Peaceful Uses of Outer Space. In addition, a basic concept of the U.S. draft is an analogy between the Antarctic Treaty and celestial bodies; also some points are covered by the Nuclear Test Ban Treaty.

The opening statement of each draft treaty constitutes a declaration of purposes. They are in agreement concerning mankind's interest in peaceful space activities, the Soviet version calling for the exploration and use of outer space for peaceful

Article 9

All areas of celestial bodies, including all stations, installations, equipment, and space vehicles on celestial bodies, shall be open at all times to representatives of other States conducting activities on celestial bodies.

Article 1

Celestial bodies are free for exploration and use by all States on a basis of equality and in accordance with international law. They are not subject to national appropriation by claim of sovereignty, by means of use or occupation, or by other means.

Article 2

There shall be freedom of scientific investigation on celestial bodies.

Article 3

States shall facilitate and encourage international cooperation in scientific investigations concerning celestial bodies.

to the peace, breach of the peace or act of aggression, and considering that the aforementioned resolution is applicable to outer space,

Have agreed on the following:

Article I

The exploration and use of outer space shall be carried out for the benefit and in the interests of all countries and shall be the province of all mankind. The Parties to the Treaty undertake to accord equal conditions to States engaged in the exploration of outer space.

Outer space, including the moon and other celestial bodies, shall be free for exploration and use by all States without discrimination of any kind, on a basis of equality and in accordance with international law, and there shall be free access to all regions of celestial bodies.

Article II

Outer space and celestial bodies shall not be subject to national appropriation by claim of sovereignty, by means of use or occupation, or by any other means.

Article III

The Parties to the Treaty shall carry on activities in the exploration and use of outer space, including the moon and other celestial bodies, in accordance with inter-

purposes, whereas the U.S. version applies to celestial bodies for "peaceful purposes only," a concept emphasized in the Antarctic Treaty. Both nations are interested in promoting international cooperation and in developing legal principles to guide states in the conduct of space activities. Both also favor the United Nations as a channel for working out a space treaty.

Articles 1, 2, and 3 are similar in providing for equality of all states and free access, the applicability of international law, international cooperation, and no claims of sovereignty. The U.S. articles apply to celestial bodies while the Soviet articles apply to outer space and celestial bodies. The provisions in both drafts that activities be carried on "in accordance with international law" and that there shall not be claims of sovereignty are similar to the wording of paragraphs in United Nations Resolution 1962 (XVIII), December 13, 1963.

Article 4

A State conducting activities on a celestial body shall (a) promptly provide the Secretary General of the United Nations with a descriptive report of the nature, conduct, and locations of such activities and (b) make the findings of such activities freely available to the public and the international scientific community.

Article 5

States in a position to do so shall, where requested or required by the circumstances, render assistance to nationals of other States engaged in activities on celestial bodies.

Article 6

All areas of celestial bodies, including all stations, installations, equipment, and space vehicles on celestial bodies, shall be open at all times to representatives of other States conducting activities on celestial bodies.

Article 7

A State may exercise authority over its facilities and persons participating in its activities on a celestial body. Ownership of objects shall not be affected by their being landed, constructed or used on a celestial body.

¹ International Cooperation and Organization for Outer Space. S. Doc. No. 56, 89th Cong., 1st sess., pp. 250-257.

national law, including the Charter of the United Nations, in the interest of maintaining international peace and security and promoting international cooperation and understanding.

No comparable provision.

Article IX

States Parties to the Treaty shall regard astronauts as envoys of mankind in outer space, and shall render to them all possible assistance in the event of accident, distress, or emergency landing on the territory of another State Party or on the high seas. Where astronauts make such a landing, their safety shall be assured and they shall be enabled promptly to return to the territory of the State Party of registry of their space vehicle.

In carrying on activities in outer space and on celestial bodies, the astronauts of one State Party shall render all possible assistance to the astronauts of other States Parties.

Note.—The Soviet Union has a somewhat comparable provision in its Article I, Paragraph 2. (See Analysis)

Article V

A State Party to the Treaty on whose registry an object launched into outer space is carried shall retain jurisdiction and control over such object, and over any personnel thereon, while it is in outer space or on a celestial body. Ownership of objects launched into outer space, including objects delivered to or constructed on a celestial body, and of their component parts, shall not be affected by their presence in outer space or on a celestial body or by their return to earth. Such objects or component parts found beyond the limits of the State Party to the Treaty on whose registry they are carried shall be returned to that State, which shall, upon request, furnish identifying data prior to their return.

Article 4 of the U.S. draft has no counterpart in the Soviets' proposed treaty. There are existing procedures in the United Nations for some reports on space activities; i.e., the registry of orbited space vehicles and national reports of space programs. National reports are now furnished the United Nations on a voluntary basis, and it should be noted that the U.S. draft treaty provides that States shall furnish reports.

Article 5 of the U.S. draft seeks to make mandatory necessary assistance to astronauts on celestial bodies. The comparable provision in article IX of the Soviet treaty applies to astronauts in outer space, on celestial bodies, on land, and on the high seas. The Soviet version is similar to United Nations Resolution 1962 (XVIII), December 13, 1963. Both the United States and the Soviet Union use the word "shall" to indicate that assistance must be provided when required by circumstances. Both the United States and the U.S.S.R. have made proposals to the Legal Subcommittee of the UN Committee on the Peaceful Uses of Outer Space for an

international agreement on assistance to and return of astronauts and space vehicles.¹

The provision in article 6 of the U.S. draft treaty requires that facilities on celestial bodies shall be open at all times to other States conducting activities on celestial bodies. The Soviet proposal in article I, paragraph 2, applies to outer space, the moon, and other celestial bodies with "free access to all regions of celestial bodies." The Soviet use of the words "all regions" might imply that these are geographic areas, thus raising the question of whether open access would be accorded to those items listed in the U.S. version: "all stations, installations, equipment, and space vehicles."

The U.S. article 7 gives a State participating in activities on a celestial body a choice as to whether to exercise authority over its facilities and persons. However, objects landed, constructed, or used on a celestial body remain in the ownership of those responsible for their presence on a celestial body.

Article V of the Soviet draft is taken practically verbatim from paragraph 7 of, United Nations Resolution 1962 (XVIII) December 13, 1963. The only difference is that the Soviet Union has made the provision apply to "celestial bodies" as well as to outer space as in the U.N. resolution.

Article 8

In accordance with the sense of General Assembly resolution 1884 (XVIII), adopted by acclamation on October 17, 1963, no State shall station on or near a celestial body any nuclear weapons or other weapons of mass destruction.

Article 9

Celestial bodies shall be used for peaceful purposes only. All States undertake to refrain from conducting on celestial bodies any activities such as the establishment of military fortifications, the carrying out of military maneuvers, or the testing of any type of weapons. The use of military personnel, facilities or equipment for scientific research or for any other peaceful purpose shall not be prohibited.

Article 10

States shall pursue studies of and, as appropriate, take steps to avoid harmful contamination of celestial bodies and adverse changes in the environment of the Earth resulting from the return of extra-terrestrial matter.

Article 11

This Agreement shall be open for signature by States Members of the United Nations or of any of the specialized agencies or Parties to the Statute of the International Court of Justice, and by any other State invited by the General Assembly of the United Nations to become a party. Any such State which does not sign this Agreement may accede to it at any time.

No comparable provision.

International Cooperation and Organization for Outer Space, pp. 22-23.

UNITED STATES DRAFT—continued

Article IV

The Parties to the Treaty undertake not to place in orbit around the earth any objects carrying nuclear weapons or other weapons of mass destruction and not to station such weapons on celestial bodies or otherwise to station them in outer space. The moon and other celestial bodies shall be used exclusively for peaceful purposes by all Parties to the Treaty. The establishment of military bases and installations, the testing of weapons and the conduct of military manoeuvres on celestial bodies shall be forbidden.

Article VIII

In the exploration and use of outer space, States Parties to the Treaty shall be guided by the principle of co-operation and mutual assistance and shall conduct all their activities in outer space, including activities on celestial bodies, with due regard for the corresponding interests of other States. States Parties to the Treaty shall conduct research on celestial bodies in such a manner as to avoid harmful contamination. If a State Party to the Treaty has reason to believe that an outer space activity or experiment planned by it or its nationals would cause potentially harmful interference with activities of other States Parties in the peaceful exploration and use of outer space, including activities on celestial bodies, it shall undertake appropriate international consultations before proceeding with any such activity or experiment. A State Party to the Treaty which has reason to believe that an outer space activity or experiment planned by another State Party would cause potentially harmful interference with activities in the peaceful exploration and use of outer space, including activities on celestial bodies, may request consultation concerning the activity or experiment.

Article VI

The Parties to the Treaty shall bear international responsibility for national activities in outer space or on celestial

U.S.S.R. DRAFT—continued

Articles 8 and 9 of the U.S. draft may be compared with article IV of the Soviet draft. Both are based upon the General Assembly United Nations Resolution 1884 (XVIII) which passed by acclamation on October 17, 1963. The resolution welcomes expressions by the United States and U.S.S.R. "not to station in outer space any objects carrying nuclear weapons or other kinds of weapons of mass destruction" and calls upon all states "(a) to refrain from placing in orbit around the earth any objects carrying nuclear weapons or any other kinds of weapons of mass destruction, installing such weapons on celestial bodies, or stationing such weapons in outer space in any other manner; (and) to refrain from causing, encouraging or in any way participating in the conduct of the foregoing activities."

The U.S. draft on the subject applies to celestial bodies and "near a celestial body."

The first sentence of Soviet article IV applies to outer space and celestial bodies, but the last sentence applies only to celestial bodies: forbidding "the establishment of military bases and installations, the testing of weapons and the conduct of military manoeuvres."

The U.S. draft specifies that the "use of military personnel, facilities or equipment for scientific research or for any other peaceful purpose shall not be prohibited."

Both drafts provide that the moon and other celestial bodies shall be used "only" and "exclusively" for peaceful purposes.

The wording of U.S. article 10 makes each state responsible for avoiding harmful contamination or adverse influences.

Soviet article VIII has practically the same wording as paragraph 7 of United Nations Resolution 1962 (XVIII) December 13, 1963. The only difference is that the resolution refers to outer space while the draft treaty refers, in addition, to celestial bodies. The Soviet draft contains procedures for consultations among states before any potentially harmful space experiments are undertaken, as in the above UN resolution.

Article VI of the Soviet draft (for which the United States has no comparable provision) is similar to paragraph 5 of United

Article VI of the Soviet draft (for which the United States has no comparable provision) is similar to paragraph 5 of United

ANALYSIS—continued

bodies, whether such activities are carried on by governmental agencies or by non-governmental bodies corporate. The activities of non-governmental bodies corporate in outer space shall require authorization and continuing supervision by the State concerned. When activities are carried on in outer space by an international organization, responsibility for compliance with this Treaty shall be borne both by the international organization and by the States Parties to the Treaty participating in such organization.

Nations Resolution 1962 (XVIII), December 13, 1963, except that celestial bodies are specifically added to outer space. Also, the U.N. resolution applies to non-governmental "entities" while the Soviet draft calls these nongovernmental "bodies corporate." Under this concept, the Communications Satellite Corp. (COMSAT) would be an "international responsibility" of the U.S. Government, which would also be responsible for its "authorization and continuing supervision." The relationship between the U.S. Government and COMSAT is already defined in the U.S. Communications Satellite Act of 1962 (Public Law 87-624 (76 Stat. 419)) and in the President's Executive Order of Jan. 4, 1965, on carrying out provisions of the COMSAT Act of 1962 on government supervision including international aspects and the role of the Secretary of State.²

No comparable provision.

Article VII

Each State Party to the Treaty which launches or organizes the launching of an object into outer space and on to celestial bodies, and each State from whose territory or facility an object is launched, is internationally liable for damage to another State Party to the Treaty or to its natural or juridical persons by such object or its component parts on the earth, in air space, in outer space or on the celestial body.

Article VII of the Soviet draft (for which the United States has no comparable provision) is similar to paragraph 8 of United Nations Resolution 1962 (XVIII), December 13, 1966. Celestial bodies are added to those environments mentioned in the resolution: the earth, air space, and outer space. The resolution extends international liability for damage to "a foreign state" while the Soviet draft treaty applies to "another State Party to the

Article 11

A Contracting Party may give notice of its withdrawal from this Agreement one year after its entry into force by written notification to the Secretary-General of the United Nations. Such withdrawal shall terminate the Agreement for that Party on acceptance of the notice.

Article 11

Any disputes arising from the interpretation or application of this Agreement may be referred by any Contracting Party thereto to the International Court of Justice for decision.

Upon ratification, approval, or accession, the date of entry into force of this Agreement, proposals for amendment, notification of acceptance of amendment, and notice of withdrawal.

Article 12

This Agreement shall be open for signature by States Members of the United Nations or of any of the specialized agencies or Parties to the Statute of the International Court of Justice, and by any other State invited by the General Assembly of the United Nations to become a party. Any such State which does not sign this Agreement may accede to it at any time.

General of the United Nations shall be deposited with the Secretary-General of the United Nations. Instruments of ratification and instruments of accession shall be deposited with the Secretary-General of the United Nations. This Agreement shall be subject to ratification or approval by signature.

² International Cooperation and Organization for Outer Space. S. Doc. No. 56, 89th Cong., 1st sess., pp. 55-56.

³ *Ibid.*, pp. 252-255.

No comparable provision.

Article X

In the event of disputes arising in connexion with the application or interpretation of the Treaty, the States Parties concerned shall immediately consult together with a view to their settlement.

Upon ratification and accession to this Treaty, the date of its entry into force, and other notices.

Article XI

1. This Treaty shall be open to all States for signature. Any State which does not sign this Treaty before its entry into force in accordance with paragraph 3 of this article may accede to it at any time.

2. This Treaty shall enter into force after . . .

Article XI

Depository Governments of a . . . which the treaty designated the shall be deposited with the Governments of ratification and instruments of accession shall be deposited with the Secretary-General of the United Nations.

3. This Treaty shall be subject to ratification or approval by signature.

Treaty * * * thus, possibly, covering a fewer number of states than the U.N. resolution. The U.S. has pending before the Legal Subcommittee of the U.N. Committee on the Peaceful Uses of Outer Space a draft "Convention Concerning Liability for Damage Caused by the Launching of Objects into Outer Space."³

Under article 11 of the U.S. draft, disputes may be referred to the International Court of Justice, thus leaving open to choice any other alternative methods of settling disputes.

Soviet Article X provides that states shall immediately consult to settle disputes with no mention of the International Court of Justice.

In articles 12 through 18, the U.S. draft agreement covers the same type of information that is handled in the six paragraphs of Soviet article XI, but there are differences in the procedures suggested.

Article 12 of the U.S. draft lists the categories of states and organizations to which the agreement is open for signature: members of the United Nations, its specialized agencies, the International Court of Justice and others invited by the General Assembly.

Article XI, paragraph 1, of the Soviet draft opens the treaty for the signature of all states whether or not they are connected with the United Nations or related agencies.

UNITED STATES DRAFT—continued

Article 13

This Agreement shall be subject to ratification or approval by signatory States. Instruments of ratification or approval and instruments of accession shall be deposited with the Secretary-General of the United Nations.

Article 14

This Agreement shall enter into force upon the deposit of the second instrument of ratification, approval, or accession. It shall enter into force as to a State ratifying, approving, or acceding thereafter upon the deposit of its instrument of ratification, approval, or accession.

Article 15

A Contracting Party may propose amendments to this Agreement. Amendments shall come into force for each Contracting Party accepting the amendments on acceptance by a majority of the Contracting Parties and thereafter for each remaining Contracting Party on acceptance by it.

Article 16

A Contracting Party may give notice of its withdrawal from this Agreement one year after its entry into force by written notification to the Secretary-General of the United Nations. Such withdrawal shall take effect one year from the date of receipt by the Secretary-General of the notification.

Article 17

The Secretary-General of the United Nations shall inform all States referred to in Article 12 of signatures, deposits of instruments of ratification, approval, or accession, the date of entry into force of this Agreement, proposals for amendment, notification of acceptances of amendments, and notices of withdrawal.

Article 18

This Agreement shall be registered in accordance with Article 102 of the Charter of the United Nations.

U.S.S.R. DRAFT—continued

Article XI

2. This Treaty shall be subject to ratification by signatory States. Instruments of ratification and instruments of accession shall be deposited with the Governments of * * *, which are hereby designated the Depositary Governments.

Article XI

3. This Treaty shall enter into force after its ratification * * *.

4. For States whose instruments of ratification or accession are deposited subsequent to the entry into force of this Treaty, it shall enter into force on the date of the deposit of their instruments of ratification or accession.

No comparable provision.

No comparable provision.

Article XI

5. The Depositary Governments shall promptly inform all signatory and acceding States of the date of each signature, the date of deposit of each instrument of ratification of and accession to this Treaty, the date of its entry into force, and other notices.

Article XI

6. This Treaty shall be registered by the Depositary Governments pursuant to Article 102 of the Charter of the United Nations.

ANALYSIS—continued

U.S. article 13 is similar to Soviet article XI, paragraph 2, both providing for ratification by signatory states. The United States wants instruments of ratification deposited with the United Nations Secretary General, whereas the Soviet Union wants the instruments deposited with certain designated depositary governments.

Article 14 of the U.S. draft provides that the agreement shall enter into force when the second instrument of ratification has been deposited. The agreement enters into force as to a ratifying state when its deposit is received.

The Soviet draft in article XI, paragraphs 3 and 4, provides that the treaty shall enter into force after its ratification, and for subsequent states after their instruments of ratification are deposited.

Article 15 of the U.S. draft provides for amendments by a majority of the contracting parties. The Soviet draft does not have a provision for amendments.

Article 16 of the U.S. draft provides for withdrawal from the agreement. The Soviet draft has no provision for withdrawal.

In its article 17, the U.S. draft provides that states shall be informed of instruments of ratification, amendments, etc., by the Secretary General of the United Nations.

The comparable provision in the Soviet article XI, paragraph 5, calls for this function of information to be performed by the depositary governments.

Article 18 of the U.S. draft (referring to an "agreement") and article XI, paragraph 6 of the Soviet draft (referring to a "treaty") provide that registration shall be in accordance with article 102 of the United Nations Charter:

Article 102, United Nations Charter

"1. Every treaty and every international agreement entered into by any Member of the United Nations after the present Charter comes into force shall as soon as possible be registered with the Secretariat and published by it.

"2. No party to any such treaty or international agreement which has not been registered in accordance with the provisions

Article 19

The original of this Agreement, of which the Chinese, English, French, Russian and Spanish texts are equally authentic, shall be deposited with the Secretary-General of the United Nations who shall send certified copies thereof to the States referred to in Article 12.

IN WITNESS WHEREOF, the undersigned, being duly authorized, have signed this Agreement.

DONE at _____, this
_____ day of _____, 196__.

Article XII

This Treaty, of which the Chinese, French, Russian, English and Spanish texts are equally authentic, shall be deposited in the archives of the Depositary Governments. Duly certified copies of this Treaty shall be transmitted by the Depositary Governments of the signatory and acceding States.

IN WITNESS WHEREOF the undersigned, duly authorized, have signed this Treaty.

DONE in _____, at the
city of _____, the
day of _____ one thousand nine
hundred and _____.

of paragraph 1 of this Article may invoke that treaty or agreement before any organ of the United Nations."

Article 19 of the U.S. draft is similar to article XII of the Soviet version in providing that the official texts shall be in Chinese, English, French, Russian, and Spanish, but the United States wants the original "agreement" deposited with the United Nations Secretary General whereas the U.S.S.R. wants the "treaty" deposited in the archives of the depositary governments. The treaty would be registered with the Secretariat of the United Nations in accordance with article 102 of the charter.

28 SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.A.R.
space shall require authorization and continuing supervision by the
State concerned. When activities are carried on in outer space by
an international organization, responsibility for compliance with the
principles set forth in this Declaration shall be borne by the inter-
national organization and by the States participating in it

**UNITED NATIONS RESOLUTION 1962 (XVIII), DECEMBER 13,
1963**

DECLARATION OF LEGAL PRINCIPLES GOVERNING ACTIVITIES OF
STATES IN THE EXPLORATION AND USE OF OUTER SPACE

The General Assembly,

Inspired by the great prospects opening up before mankind as a result of man's entry into outer space,

Recognizing the common interest of all mankind in the progress of the exploration and use of outer space for peaceful purposes,

Believing that the exploration and use of outer space should be for the betterment of mankind and for the benefit of States irrespective of their degree of economic or scientific development,

Desiring to contribute to broad international cooperation in the scientific as well as in the legal aspects of exploration and use of outer space for peaceful purposes,

Believing that such co-operation will contribute to the development of mutual understanding and to the strengthening of friendly relations between nations and peoples,

Recalling General Assembly resolution 110 (II) of 3 November 1947, which condemned propaganda designed or likely to provoke or encourage any threat to the peace, breach of the peace, or act of aggression, and considering that the aforementioned resolution is applicable to outer space,

Taking into consideration General Assembly resolutions 1721 (XVI) of 20 December 1961 and 1802 (XVII) of 14 December 1962, approved unanimously by the States Members of the United Nations,

Solemnly declares that in the exploration and use of outer space States should be guided by the following principles:

1. The exploration and use of outer space shall be carried on for the benefit and in the interest of all mankind.

2. Outer space and celestial bodies are free for exploration and use by all States on a basis of equality and in accordance with international law.

3. Outer space and celestial bodies are not subject to national appropriation by claim of sovereignty, by means of use or occupation, or by any other means.

4. The activities of States in the exploration and use of outer space shall be carried on in accordance with international law including the Charter of the United Nations, in the interest of maintaining international peace and security and promoting international co-operation and understanding.

5. States bear international responsibility for national activities in outer space, whether carried on by governmental agencies or by non-governmental entities, and for assuring that national activities are carried on in conformity with the principles set forth in this Declaration. The activities of non-governmental entities in outer

space shall require authorization and continuing supervision by the State concerned. When activities are carried on in outer space by an international organization, responsibility for compliance with the principles set forth in this Declaration shall be borne by the international organization and by the States participating in it.

6. In the exploration and use of outer space, States shall be guided by the principle of co-operation and mutual assistance and shall conduct all their activities in outer space with due regard for the corresponding interests of other States. If a State has reason to believe that an outer space activity or experiment planned by it or its nationals would cause potentially harmful interference with activities of other States in the peaceful exploration and use of outer space, it shall undertake appropriate international consultations before proceeding with any such activity or experiment. A State which has reason to believe that an outer space activity or experiment planned by another State would cause potentially harmful interference with activities in the peaceful exploration and use of outer space may request consultation concerning the activity or experiment.

7. The State on whose registry an object launched into outer space is carried shall retain jurisdiction and control over such object, and any personnel thereon, while in outer space. Ownership of objects launched into outer space, and of their component parts, is not affected by their passage through outer space or by their return to the earth. Such objects or component parts found beyond the limits of the State of registry shall be returned to that State, which shall furnish identifying data upon request prior to return.

8. Each State which launches or procures the launching of an object into outer space, and each State from whose territory or facility an object is launched, is internationally liable for damage to a foreign State or to its natural or juridical persons by such object or its component parts on the earth, in air space, or in outer space.

9. States shall regard astronauts as envoys of mankind in outer space, and shall render to them all possible assistance in the event of accident, distress, or emergency landing on the territory of a foreign State or on the high seas. Astronauts who make such a landing shall be safely and promptly returned to the State of registry of their space vehicle.

30 SPACE TREATY PROPOSALS BY THE UNITED STATES AND U.S.S.R.

(b) Compilation in cooperation with UNESCO (United Nations Educational, Scientific and Cultural Organization) of reviews of information on facilities for education and training in basic subjects related to the peaceful uses of outer space in universities and other places of learning.

UNITED NATIONS RESOLUTION 1963 (XVIII), DECEMBER 13, 1963

INTERNATIONAL COOPERATION IN THE PEACEFUL USES OF OUTER SPACE

The General Assembly,

Recalling its resolutions 1721 (XVI) of 20 December 1961 and 1802 (XVII) of 14 December 1962, on international co-operation in the peaceful uses of outer space,

Having considered the Report (A/5549 and A/5549/Add. 1) submitted by the Committee on the Peaceful Uses of Outer Space,

Mindful of the benefits which all Member States would enjoy by participation in international programmes of co-operation in this field,

I

1. *Recommends* that consideration should be given to incorporating in international agreement form, in the future as appropriate, legal principles governing the activities of the States in the exploration and use of outer space;

2. *Requests* the Committee on the Peaceful Uses of Outer Space to continue to study and report on legal problems which may arise in the exploration and use of outer space, and in particular to arrange for the prompt preparation of draft international agreements on liability for damage caused by objects launched into outer space and on assistance to and return of astronauts and space vehicles;

3. *Further requests* the Committee on the Peaceful Uses of Outer Space to report to the General Assembly at its nineteenth session on the results achieved in preparing these two agreements;

II

1. *Endorses* the recommendations of the Report of the Committee on the Peaceful Uses of Outer Space concerning exchange of information, encouragement of international programs, international sounding rocket facilities, education and training and potentially harmful effects of space experiments;

2. *Welcomes* the decision of the Committee, in cooperation with the Secretary-General and making full use of the functions and resources of the Secretariat, to undertake the following:

(a) Preparation of a working paper on the activities and resources of the United Nations, of its specialized agencies, and of other competent international bodies relating to the peaceful uses of outer space;

(b) Preparation of a summary of national and of cooperative international space activities;

(c) Preparation of a list of available bibliographic and abstracting services covering the scientific and technical results and publications in space and space-related areas;

(d) Compilation in cooperation with UNESCO (United Nations Educational, Scientific and Cultural Organization) of reviews of information on facilities for education and training in basic subjects related to the peaceful uses of outer space in universities and other places of learning;

(e) Establishment, at the request of the Government of India, of a group of six scientists to visit the sounding-rocket launching facility at Thumba and to advise the Committee on its eligibility for United Nations sponsorship in accordance with the basic principles endorsed by the General Assembly in resolution 1802 (XVII).

3. *Notes with appreciation* that, in accordance with General Assembly resolution 1721 (XVI), the Secretary-General is maintaining a public registry of objects launched into orbit or beyond on the basis of information being furnished by States Members of the United Nations;

4. *Notes with appreciation* that certain Member States have, on a voluntary basis, provided information on their national space programmes and invites other Member States to do so;

5. *Invites* Member States to give favourable consideration to requests of countries desirous of participating in the peaceful exploration of outer space for appropriate training and technical assistance on a bilateral basis or on any other basis they see fit;

6. *Notes* the considerable measure of co-operation in the peaceful exploration and use of outer space under way among Member States;

7. *Notes* that the United States and the Soviet Union have reached an agreement looking toward co-operation in the fields of satellite meteorology, communications and magnetic field mapping;

8. *Encourages* Member States to continue and extend co-operative arrangements so that all Members can benefit from the peaceful exploration and use of outer space;

9. *Believes* that international co-operation can be beneficial in furthering the exploration of the solar system;

III

1. *Notes with appreciation* (a) the Second Report of the World Meteorological Organization on the advancement of atmospheric sciences and their application in the light of developments in outer space and (b) the organizational and financial steps taken by the Fourth Congress of the World Meteorological Organization in response to resolutions 1721 C (XVI) and 1802 III (XVII);

2. *Endorses* efforts toward the establishment of a World Weather Watch under the auspices of the World Meteorological Organization to include the use of satellite as well as conventional data with data centres to facilitate the effectiveness of the system;

3. *Urges* that Member States (a) extend their national and regional meteorological efforts to implement the expanded programme of the World Meteorological Organization, (b) co-operate in the establishment of the World Weather Watch, and (c) increase research and training in the atmospheric sciences;

4. *Invites* the World Meteorological Organization to make a progress report to the Committee on the Peaceful Uses of Outer Space in 1964 relating to its activities in this field;

IV

1. *Notes with appreciation* the Second Report of the International Telecommunication Union on Telecommunication and the Peaceful Uses of Outer Space;

2. *Welcomes* the decisions of the October–November 1963 Extraordinary Administrative Radio Conference convened by the International Telecommunication Union on the allocation of frequency bands for space communication and procedures for their use as a step in the development of space radio communications;

3. *Invites* the International Telecommunication Union to make a progress report to the Committee on the Peaceful Uses of Outer Space in 1964 relating to its activities in this field;

4. *Recognizes* the potential contribution of communications satellites in the expansion of global telecommunications facilities and the possibilities this offers for increasing the flow of information and for furthering the objectives of the United Nations and its agencies;

V

Requests the Committee on the Peaceful Uses of Outer Space to continue its work as set forth in General Assembly resolutions 1472 (XIV), 1721 (XVI), 1802 (XVII), and in this resolution, and to report to the General Assembly at its nineteenth session on the activities of the Committee.

Article 1

Celestial bodies are free for exploration and use by all States on a basis of equality and in accordance with international law. They are not subject to national appropriation by claim of sovereignty, by means of use or occupation, or by other means.

Article 2

There shall be freedom of scientific investigation on celestial bodies.

Article 3

States shall facilitate and encourage international cooperation in scientific investigations concerning celestial bodies.

1. Welcomes the decision of the October-November 1963 Extraordinary Administrative Radio Conference convened by the International Telecommunication Union on the allocation of frequency bands for space communication and procedures for their use as a step in the development of space radio communications;

2. Welcomes the decision of the October-November 1963 Extraordinary Administrative Radio Conference convened by the International Telecommunication Union on the allocation of frequency bands for space communication and procedures for their use as a step in the development of space radio communications;

3. Welcomes the decision of the October-November 1963 Extraordinary Administrative Radio Conference convened by the International Telecommunication Union on the allocation of frequency bands for space communication and procedures for their use as a step in the development of space radio communications;

UNITED NATIONS RESOLUTION 1884 (XVIII), OCTOBER 17, 1963

QUESTION OF GENERAL AND COMPLETE DISARMAMENT

The General Assembly,

Recalling its resolution 1721 A (XVI) of 20 December 1961, in which it expressed the belief that the exploration and use of outer space should be only for the betterment of mankind,

Determined to take steps to prevent the spread of the arms race to outer space,

1. *Welcomes* the expressions by the Union of Soviet Socialist Republics and the United States of America of their intention not to station in outer space any objects carrying nuclear weapons or other kinds of weapons of mass destruction;

2. *Solemnly calls upon* all States:

(a) to refrain from placing in orbit around the earth any objects carrying nuclear weapons or any kinds of weapons of mass destruction, installing such weapons on celestial bodies, or stationing such weapons in outer space in any other manner;

(b) To refrain from causing, encouraging or in any way participating in the conduct of the foregoing activities.

TREATY BANNING NUCLEAR WEAPON TESTS IN THE ATMOSPHERE, IN OUTER SPACE, AND UNDER WATER

The Governments of the United States of America, the United Kingdom of Great Britain, and Northern Ireland, and the Union of Soviet Socialist Republics, hereinafter referred to as the "Original Parties",

Proclaiming as their principal aim the speediest possible achievement of an agreement on general and complete disarmament under strict international control in accordance with the objectives of the United Nations which would put an end to the armaments race and eliminate the incentive to the production and testing of all kinds of weapons, including nuclear weapons,

Seeking to achieve the discontinuance of all test explosions of nuclear weapons for all time, determined to continue negotiations to this end, and desiring to put an end to the contamination of man's environment by radioactive substances,

Have agreed as follows:

ARTICLE I

1. Each of the Parties to this Treaty undertakes to prohibit, to prevent, and not to carry out any nuclear weapon test explosion, or any other nuclear explosion, at any place under its jurisdiction or control:

(a) in the atmosphere; beyond its limits, including outer space; or underwater, including territorial waters or high seas; or

(b) in any other environment if such explosion causes radioactive debris to be present outside the territorial limits of the State under whose jurisdiction or control such explosion is conducted. It is understood in this connection that the provisions of this subparagraph are without prejudice to the conclusion of a treaty resulting in the permanent banning of all nuclear test explosions, including all such explosions underground, the conclusion of which, as the Parties have stated in the Preamble to this Treaty, they seek to achieve.

2. Each of the Parties to this Treaty undertakes furthermore to refrain from causing, encouraging, or in any way participating in, the carrying out of any nuclear weapons test explosion, or any other nuclear explosion, anywhere which would take place in any of the environments described, or have the effect referred to, in paragraph 1 of this Article.

ARTICLE II

1. Any Party may propose amendments to this Treaty. The text of any proposed amendment shall be submitted to the Depositary Governments which shall circulate it to all Parties to this Treaty. Thereafter, if requested to do so by one-third or more of the Parties, the Depositary Governments shall convene a conference, to which they shall invite all the Parties, to consider such amendment.

2. Any amendment to this Treaty must be approved by a majority of the votes of all the Parties to this Treaty, including the votes of all of the Original Parties. The amendment shall enter into force for all Parties upon the deposit of instruments of ratification by a majority of all the Parties, including the instruments of ratification of all of the Original Parties.

ARTICLE III

1. This Treaty shall be open to all States for signature. Any State which does not sign this Treaty before its entry into force in accordance with paragraph 3 of this Article may accede to it at any time.

2. This Treaty shall be subject to ratification by signatory States. Instruments of ratification and instruments of accession shall be deposited with the Governments of the Original Parties—the United States of America, the United Kingdom of Great Britain and Northern Ireland, and the Union of Soviet Socialist Republics—which are hereby designated the Depositary Governments.

3. This Treaty shall enter into force after its ratification by all the Original Parties and the deposit of their instruments of ratification.

4. For States whose instruments of ratification or accession are deposited subsequent to the entry into force of this Treaty, it shall enter into force on the date of the deposit of their instruments of ratification or accession.

5. The Depositary Governments shall promptly inform all signatory and acceding States of the date of each signature, the date of deposit of each instrument of ratification of and accession to this Treaty, the date of its entry into force, and the date of receipt of any requests for conferences or other notices.

6. This Treaty shall be registered by the Depositary Governments pursuant to Article 102 of the Charter of the United Nations.

ARTICLE IV

This Treaty shall be of unlimited duration.

Each Party shall in exercising its national sovereignty have the right to withdraw from the Treaty if it decides that extraordinary events, related to the subject matter of this Treaty, have jeopardized the supreme interests of its country. It shall give notice of such withdrawal to all other Parties to the Treaty three months in advance.

ARTICLE V

This Treaty, of which the English and Russian texts are equally authentic, shall be deposited in the archives of the Depositary Governments. Duly certified copies of this Treaty shall be transmitted by the Depositary Governments to the Governments of the signatory and acceding States.

IN WITNESS WHEREOF, the undersigned, duly authorized, have signed this Treaty.

DONE in triplicate at the city of Moscow the fifth day of August, one thousand nine hundred and sixty-three.

For the Government of the United States of America

For the Government of the United Kingdom of Great Britain and Northern Ireland

For the Government of the Union of Soviet Socialist Republics

Status of Treaty as of July 19, 1966

U.S. DEPOSITORY ORIGINAL OF THE TREATY BANNING NUCLEAR
WEAPON TESTS IN THE ATMOSPHERE, IN OUTER SPACE AND UNDER
WATER DONE AT MOSCOW ON AUG. 5, 1963¹

| State | Date of signature ² | Date of deposit of instrument of ratification | Date of deposit of instrument of accession |
|-----------------------------------|--------------------------------|---|--|
| Afghanistan | Aug. 8, 1963 | Mar. 13, 1964 | |
| Algeria | Aug. 14, 1963 | | |
| Argentina | Aug. 8, 1963 | | |
| Australia | do | Nov. 12, 1963 | |
| Austria | Sept. 11, 1963 | July 17, 1964 | |
| Belgium | Aug. 8, 1963 | Mar. 1, 1966 | |
| Bolivia | do | Aug. 4, 1965 | |
| Brazil | do | Jan. 15, 1965 | |
| Bulgaria | do | Nov. 13, 1963 | |
| Burma | Aug. 14, 1963 | Nov. 15, 1963 | |
| Burundi | Oct. 4, 1963 | | |
| Cameroon | Aug. 27, 1963 | | |
| Canada | Aug. 8, 1963 | Jan. 28, 1964 | |
| Central African Republic | | | Dec. 22, 1964 |
| Ceylon | Aug. 22, 1963 | Feb. 5, 1964 | |
| Chad | Aug. 26, 1963 | Mar. 1, 1965 | |
| Chile | Aug. 8, 1963 | | |
| China, Republic of | Aug. 23, 1963 | May 18, 1964 | |
| Colombia | Aug. 16, 1963 | | |
| Congo (Léopoldville) | Aug. 9, 1963 | Oct. 28, 1965 | |
| Costa Rica | Aug. 13, 1963 | | |
| Cyprus | Aug. 8, 1963 | May 7, 1965 | |
| Czechoslovakia | do | Oct. 17, 1963 | |
| Dahomey | Aug. 27, 1963 | Dec. 15, 1964 | |
| Denmark | Aug. 9, 1963 | Jan. 15, 1964 | |
| Dominican Republic | Sept. 16, 1963 | July 22, 1964 | |
| Ecuador | Sept. 27, 1963 | May 6, 1964 | |
| El Salvador | Aug. 21, 1963 | Dec. 3, 1964 | |
| Ethiopia | Aug. 9, 1963 | | |
| Finland | Aug. 8, 1963 | Jan. 9, 1964 | |
| Gabon Gambia (1) | Sept. 10, 1963 | Feb. 20, 1964 | |
| Germany, Federal Repub- lic of | Aug. 19, 1963 | Dec. 1, 1964 (2) | |
| Ghana | Aug. 9, 1963 | Jan. 9, 1964 | |
| Greece | Aug. 8, 1963 | Dec. 18, 1963 | |
| Guatemala | Sept. 23, 1963 | Jan. 6, 1964 (3) | |
| Haiti | Oct. 9, 1963 | | |
| Honduras | Aug. 8, 1963 | Oct. 2, 1964 | |
| Hungary | do | Oct. 22, 1963 | |
| Iceland | Aug. 12, 1963 | Apr. 29, 1964 | |
| India | Aug. 8, 1963 | Oct. 18, 1963 | |
| Indonesia | Aug. 23, 1963 | Jan. 27, 1964 | |
| Iran | Aug. 8, 1963 | May 5, 1964 | |
| Iraq | Aug. 13, 1963 | Dec. 1, 1964 | |
| Ireland | Aug. 8, 1963 | Dec. 18, 1963 | |
| Israel | do | Jan. 15, 1964 | |
| Italy | do | Dec. 10, 1964 | |
| Ivory Coast | Sept. 5, 1963 | Feb. 5, 1965 | |
| Jamaica | Aug. 13, 1963 | | |
| Japan | Aug. 14, 1963 | June 15, 1964 | |
| Jordan | Aug. 12, 1963 | July 10, 1964 | |
| Kenya | | | June 11, 1965 |
| Korea, Republic of | Aug. 30, 1963 | July 24, 1964 (4) | |
| Kuwait | Aug. 20, 1963 | May 20, 1965 (5) | |

See footnotes at end of table, p. 37.

U.S. DEPOSITARY ORIGINAL OF THE TREATY BANNING NUCLEAR
WEAPON TESTS IN THE ATMOSPHERE, IN OUTER SPACE AND UNDER
WATER DONE AT MOSCOW ON AUG. 5, 1963¹—Continued

| State | Date of signature ² | Date of deposit of instrument of ratification | Date of deposit of instrument of accession |
|---|--------------------------------|---|--|
| Laos..... | Aug. 12, 1963 | Feb. 12, 1965 | |
| Lebanon..... | do..... | May 14, 1965 | |
| Liberia..... | Aug. 8, 1963 | May 19, 1964 | |
| Libya..... | Aug. 16, 1963 | | |
| Luxembourg..... | Sept. 3, 1963 | Feb. 10, 1965 | |
| Malagasy Republic..... | Sept. 23, 1963 | Mar. 15, 1965 | |
| Malawi (6)..... | | | |
| Malaysia (7)..... | Aug. 8, 1963 | July 16, 1964 | |
| Mali..... | Aug. 23, 1963 | | |
| Malta (8)..... | | | |
| Mauritania..... | Sept. 13, 1963 | Apr. 6, 1964 | |
| Mexico..... | Aug. 8, 1963 | Dec. 27, 1963 | |
| Morocco..... | Aug. 27, 1963 | Feb. 21, 1966 | |
| Nepal..... | Aug. 30, 1963 | Oct. 7, 1964 | |
| Netherlands, Kingdom of..... | Aug. 9, 1963 | Sept. 14, 1964 (9) | |
| New Zealand..... | Aug. 8, 1963 | Oct. 10, 1963 | |
| Nicaragua..... | Aug. 13, 1963 | Feb. 26, 1965 | |
| Niger..... | Sept. 24, 1963 | July 9, 1964 | |
| Nigeria, Federation of..... | Sept. 4, 1963 | | |
| Norway..... | Aug. 9, 1963 | Nov. 21, 1963 | |
| Pakistan..... | Aug. 14, 1963 | | |
| Panama..... | Sept. 20, 1963 | Feb. 24, 1966 | |
| Paraguay..... | Aug. 15, 1963 | | |
| Peru..... | Aug. 23, 1963 | July 20, 1964 | |
| Philippines..... | Aug. 8, 1963 | Nov. 15, 1965 (10) | |
| Poland..... | do..... | Oct. 14, 1963 | |
| Portugal..... | Oct. 9, 1963 | | |
| Rumania..... | Aug. 8, 1963 | Dec. 12, 1963 | |
| Rwanda..... | Sept. 19, 1963 | Dec. 27, 1963 | |
| San Marino..... | Sept. 17, 1963 | July 9, 1964 | |
| Senegal..... | Sept. 20, 1963 | June 2, 1964 | |
| Sierra Leone..... | Sept. 11, 1963 | Mar. 4, 1964 | |
| Somali Republic..... | Aug. 19, 1963 | | |
| South Africa..... | | | Oct. 10, 1963 |
| Spain..... | Aug. 13, 1963 | Dec. 17, 1964 | |
| Sudan..... | Aug. 9, 1963 | Mar. 4, 1966 | |
| Sweden..... | Aug. 12, 1963 | Dec. 9, 1963 | |
| Switzerland..... | Aug. 26, 1963 | Jan. 16, 1964 | |
| Syrian Arab Republic..... | Aug. 13, 1963 | June 1, 1964 | |
| Tanganyika..... | Sept. 18, 1963 | | |
| Thailand..... | Aug. 8, 1963 | Nov. 29, 1963 | |
| Togo..... | Sept. 18, 1963 | Dec. 7, 1964 | |
| Trinidad and Tobago..... | Aug. 12, 1963 | July 14, 1964 | |
| Tunisia..... | Aug. 8, 1963 | June 3, 1965 | |
| Turkey..... | Aug. 9, 1963 | July 8, 1965 | |
| Uganda..... | Aug. 29, 1963 | Apr. 2, 1964 | |
| Union of Soviet Socialist Republics..... | Aug. 5, 1963 | Oct. 10, 1963 | |
| United Arab Republic..... | Aug. 8, 1963 | Jan. 10, 1964 (11) | |
| United Kingdom of Great Britain and Northern Ireland..... | Aug. 5, 1963 | Oct. 10, 1963 | |
| United States of America..... | do..... | do..... | |
| Upper Volta..... | Aug. 30, 1963 | | |
| Uruguay..... | Aug. 12, 1963 | | |

¹ See footnotes at end of table, p. 37.

U.S. DEPOSITARY ORIGINAL OF THE TREATY BANNING NUCLEAR WEAPON TESTS IN THE ATMOSPHERE, IN OUTER SPACE AND UNDER WATER DONE AT MOSCOW ON AUG. 5, 1963¹—Continued

| State | Date of signature ² | Date of deposit of instrument of ratification | Date of deposit of instrument of accession |
|---------------------|--------------------------------|---|--|
| Venezuela | Aug. 16, 1963 | Mar. 29, 1965 | |
| Vietnam | Oct. 1, 1963 | | |
| Western Samoa | Sept. 6, 1963 | Jan. 15, 1965 | |
| Yemen Arab Republic | do | | |
| Yugoslavia | Aug. 8, 1963 | Apr. 3, 1964 | |
| Zambia (12) | | | |

¹ The Treaty entered into force for the United States of America, the United Kingdom of Great Britain and Northern Ireland, and the Union of Soviet Socialist Republics on Oct. 10, 1963.

Article III (4) of the Treaty provides: "For States whose instruments of ratification or accession are deposited subsequent to the entry into force of this Treaty, it shall enter into force on the date of the deposit of their instruments of ratification or accession."

² Signatures for the United States of America, the United Kingdom of Great Britain and Northern Ireland, and the Union of Soviet Socialist Republics were affixed at Moscow. All other signatures were affixed at Washington.

(1) The Prime Minister of the *Gambia* notified the Secretary of State by a note dated April 27, 1965 that the Government of the *Gambia* "confirm that they regard themselves as continuing to be bound by the Treaty banning nuclear weapon tests in the atmosphere, in outer space and under water, signed at Moscow on the 5th August 1963, and ratified by the British Government on the 10th October 1963, at which time the latter Government were responsible for the international relations of the *Gambia*."

(2) The instrument of ratification by the *Federal Republic of Germany* contains a Declaration of the Federal Minister of Foreign Affairs which reads (in translation) as follows:

"The above-cited Treaty shall take effect on the day on which it enters into force for the Federal Republic of Germany also with respect to *Land Berlin*, subject to the rights and responsibilities of the Allied authorities and the powers vested in them in the field of disarmament and demilitarization."

(3) The instrument of ratification by *Guatemala* contains the following statement designated as a "reservation":

"The signature, approval, ratification, and application of the Treaty banning nuclear weapon tests in the atmosphere, outer space, and under water by the Government of Guatemala shall not imply recognition by the Republic of Guatemala of any territory as a sovereign State or of any régime as a legal government that, as of this date, are not recognized by it. Neither shall it imply the establishment or resumption of diplomatic relations with any countries with which it does not at present maintain them." [translation]

(4) The instrument of ratification by the *Republic of Korea* was accompanied by the Statement that "the ratification by the Government of the Republic of Korea of the said Treaty does not in any way mean or imply the recognition of any territory or regime which has not been recognized by the Republic of Korea as a State or Government".

(5) The instrument of ratification by *Kuwait* was transmitted with a note of the Minister of Foreign Affairs of Kuwait containing the following statements:

"In ratifying the said Convention, the Government of the State of Kuwait takes the view that its signature and ratification of the said Convention does not in any way imply its recognition of Israel, nor does it oblige it to apply the provisions of the Convention in respect of the said country.

"The Government of the State of Kuwait wishes further to indicate that its understanding described above is in conformity with the general practice existing in Kuwait regarding signature, ratification or accession to a Convention of which a country not recognized by Kuwait is a party."

(6) The Prime Minister and Minister of External Affairs of *Malawi* notified the Secretary of State by a note dated November 26, 1964, that "the Government of Malawi confirm that they regard themselves as continuing to be bound by the said Treaty."

(7) Signature affixed for the *Federation of Malaya*.

(8) The Prime Minister of *Malta* notified the Secretary of State by a note dated November 25, 1964, that "the Government of Malta confirm that they regard themselves as continuing to be bound by the Treaty banning nuclear weapon tests in the atmosphere, in outer space and under water signed at Moscow on 5th August, 1963, which was ratified by the British Government on 10th October, 1963, at which time the latter Government were responsible for the international relations of Malta."

(9) It is stated in the *Netherlands* instrument of ratification that the Treaty is approved "pour le Royaume en Europe, le Surinam et les Antilles Néerlandaises".

(10) The instrument of ratification by the *Philippines* was accompanied by the following statement: "In depositing the said Instrument, the Philippine Government would like to state that ratification of the Treaty should not be construed as including or implying recognition by the Philippines of any State or Government party to the Treaty which has not heretofore been recognized by the Philippines."

(11) The instrument of ratification by the *United Arab Republic* was accompanied by the statement that "The ratification by the Government of the United Arab Republic of this Treaty does not mean or imply any recognition of Israel or any Treaty Relations with Israel."

(12) The Minister of Foreign Affairs of *Zambia* notified the Secretary of State by a note dated January 11, 1965 that "the Government of the Republic of Zambia regards itself as continuing to be bound by the Treaty banning nuclear weapon tests in the atmosphere in outer space and under water, which was signed at Moscow on the 5th August, 1963. The Treaty was ratified on 10th October, 1963, by the Government of the United Kingdom which had at that date responsibility for the international relations of the country now known as the Republic of Zambia."

Department of State, July 19, 1966,

Washington, D.C.

THE ANTARCTIC TREATY*

The Governments of Argentina, Australia, Belgium, Chile, the French Republic, Japan, New Zealand, Norway, the Union of South Africa, the Union of Soviet Socialist Republics, the United Kingdom of Great Britain and Northern Ireland, and the United States of America,

Recognizing that it is in the interest of all mankind that Antarctica shall continue forever to be used exclusively for peaceful purposes and shall not become the scene or object of international discord;

Acknowledging the substantial contributions to scientific knowledge resulting from international cooperation in scientific investigation in Antarctica;

Convinced that the establishment of a firm foundation for the continuation and development of such cooperation on the basis of freedom of scientific investigation in Antarctica as applied during the International Geophysical Year accords with the interests of science and the progress of all mankind;

Convinced also that a treaty ensuring the use of Antarctica for peaceful purposes only and the continuance of international harmony in Antarctica will further the purposes and principles embodied in the Charter of the United Nations;

Have agreed as follows:

ARTICLE I

1. Antarctica shall be used for peaceful purposes only. There shall be prohibited, *inter alia*, any measures of a military nature, such as the establishment of military bases and fortifications, the carrying out of military maneuvers, as well as the testing of any type of weapons.

2. The present Treaty shall not prevent the use of military personnel or equipment for scientific research or for any other peaceful purpose.

ARTICLE II

Freedom of scientific investigation in Antarctica and cooperation toward that end, as applied during the International Geophysical Year, shall continue, subject to the provisions of the present Treaty.

ARTICLE III

1. In order to promote international cooperation in scientific investigation in Antarctica, as provided for in Article II of the present

*The reader's attention is especially called to another treaty which is pertinent to outer space: "The Radio Regulations, with Appendixes and an Additional Protocol," signed at Geneva, Dec. 21, 1959. This treaty concerns international allocation of radio channels, their regulation and use, a subject of significance to space law. This technical document is not included in the symposium because of its length. See U.S. Senate, Executive I, 86th Cong., 2d sess. June 9, 1960. 571 pp.

Treaty, the Contracting Parties agree that, to the greatest extent feasible and practicable:

(a) information regarding plans for scientific programs in Antarctica shall be exchanged to permit maximum economy and efficiency of operations;

(b) scientific personnel shall be exchanged in Antarctica between expeditions and stations;

(c) scientific observations and results from Antarctica shall be exchanged and made freely available.

2. In implementing this Article, every encouragement shall be given to the establishment of cooperative working relations with those Specialized Agencies of the United Nations and other international organizations having a scientific or technical interest in Antarctica.

ARTICLE IV

1. Nothing contained in the present Treaty shall be interpreted as:

(a) a renunciation by any Contracting Party of previously asserted rights of or claims to territorial sovereignty in Antarctica;

(b) a renunciation or diminution by any Contracting Party of any basis of claim to territorial sovereignty in Antarctica which it may have whether as a result of its activities or those of its nationals in Antarctica, or otherwise;

(c) prejudicing the position of any Contracting Party as regards its recognition or non-recognition of any other State's right of or claim or basis of claim to territorial sovereignty in Antarctica.

2. No acts or activities taking place while the present Treaty is in force shall constitute a basis for asserting, supporting or denying a claim to territorial sovereignty in Antarctica or create any rights of sovereignty in Antarctica. No new claim, or enlargement of an existing claim, to territorial sovereignty in Antarctica shall be asserted while the present Treaty is in force.

ARTICLE V

1. Any nuclear explosions in Antarctica and the disposal there of radioactive waste material shall be prohibited.

2. In the event of the conclusion of international agreements concerning the use of nuclear energy, including nuclear explosions and the disposal of radioactive waste material, to which all of the Contracting Parties whose representatives are entitled to participate in the meetings provided for under Article IX are parties, the rules established under such agreements shall apply in Antarctica.

ARTICLE VI

The provisions of the present Treaty shall apply to the area south of 60° South Latitude, including all ice shelves, but nothing in the present Treaty shall prejudice or in any way affect the rights, or the exercise of the rights, of any State under international law with regard to the high seas within that area.

ARTICLE VII

1. In order to promote the objectives and ensure the observance of the provisions of the present Treaty, each Contracting Party whose representatives are entitled to participate in the meetings referred to in Article IX of the Treaty shall have the right to designate observers to carry out any inspection provided for by the present Article. Observers shall be nationals of the Contracting Parties which designate them. The names of observers shall be communicated to every other Contracting Party having the right to designate observers, and like notice shall be given of the termination of their appointment.

2. Each observer designated in accordance with the provisions of paragraph 1 of this Article shall have complete freedom of access at any time to any or all areas of Antarctica.

3. All areas of Antarctica, including all stations, installations and equipment within those areas, and all ships and aircraft at points of discharging or embarking cargoes or personnel in Antarctica, shall be open at all times to inspection by any observers designated in accordance with paragraph 1 of this Article.

4. Aerial observation may be carried out at any time over any or all areas of Antarctica by any of the Contracting Parties having the right to designate observers.

5. Each Contracting Party shall, at the time when the present Treaty enters into force for it, inform the other Contracting Parties, and thereafter shall give them notice in advance, of—

(a) all expeditions to and within Antarctica, on the part of its ships or nationals, and all expeditions to Antarctica organized in or proceeding from its territory;

(b) all stations in Antarctica occupied by its nationals; and

(c) any military personnel or equipment intended to be introduced by it into Antarctica subject to the conditions prescribed in paragraph 2 of Article I of the present Treaty.

ARTICLE VIII

1. In order to facilitate the exercise of their functions under the present Treaty, and without prejudice to the respective positions of the Contracting Parties relating to jurisdiction over all other persons in Antarctica, observers designated under paragraph 1 of Article VII and scientific personnel exchanged under subparagraph 1(b) of Article III of the Treaty, and members of the staffs accompanying any such persons, shall be subject only to the jurisdiction of the Contracting Party of which they are nationals in respect of all acts or omissions occurring while they are in Antarctica for the purpose of exercising their functions.

2. Without prejudice to the provisions of paragraph 1 of this Article, and pending the adoption of measures in pursuance of subparagraph 1(e) of Article IX, the Contracting Parties concerned in any case of dispute with regard to the exercise of jurisdiction in Antarctica shall immediately consult together with a view to reaching a mutually acceptable solution.

ARTICLE IX

1. Representatives of the Contracting Parties named in the preamble to the present Treaty shall meet at the City of Canberra within two months after the date of entry into force of the Treaty, and thereafter at suitable intervals and places, for the purpose of exchanging information, consulting together on matters of common interest pertaining to Antarctica, and formulating and considering, and recommending to their Governments, measures in furtherance of the principles and objectives of the Treaty, including measures regarding:

- (a) use of Antarctica for peaceful purposes only;
- (b) facilitation of scientific research in Antarctica;
- (c) facilitation of international scientific cooperation in Antarctica;
- (d) facilitation of the exercise of the rights of inspection provided for in Article VII of the Treaty;
- (e) questions relating to the exercise of jurisdiction in Antarctica;
- (f) preservation and conservation of living resources in Antarctica.

2. Each Contracting Party which has become a party to the present Treaty by accession under Article XIII shall be entitled to appoint representatives to participate in the meetings referred to in paragraph 1 of the present Article, during such time as that Contracting Party demonstrates its interest in Antarctica by conducting substantial scientific research activity there, such as the establishment of a scientific station or the despatch of a scientific expedition.

3. Reports from the observers referred to in Article VII of the present Treaty shall be transmitted to the representatives of the Contracting Parties participating in the meetings referred to in paragraph 1 of the present Article.

4. The measures referred to in paragraph 1 of this Article shall become effective when approved by all the Contracting Parties whose representatives were entitled to participate in the meetings held to consider those measures.

5. Any or all of the rights established in the present Treaty may be exercised as from the date of entry into force of the Treaty whether or not any measures facilitating the exercise of such rights have been proposed, considered or approved as provided in this Article.

ARTICLE X

Each of the Contracting Parties undertakes to exert appropriate efforts, consistent with the Charter of the United Nations, to the end that no one engages in any activity in Antarctica contrary to the principles or purposes of the present Treaty.

ARTICLE XI

1. If any dispute arises between two or more of the Contracting Parties concerning the interpretation or application of the present Treaty, those Contracting Parties shall consult among themselves

with a view to having the dispute resolved by negotiation, inquiry, mediation, conciliation, arbitration, judicial settlement or other peaceful means of their own choice.

2. Any dispute of this character not so resolved shall, with the consent, in each case, of all parties to the dispute, be referred to the International Court of Justice for settlement; but failure to reach agreement on reference to the International Court shall not absolve parties to the dispute from the responsibility of continuing to seek to resolve it by any of the various peaceful means referred to in paragraph 1 of this Article.

ARTICLE XII

1. (a) The present Treaty may be modified or amended at any time by unanimous agreement of the Contracting Parties whose representatives are entitled to participate in the meetings provided for under Article IX. Any such modification or amendment shall enter into force when the depositary Government has received notice from all such Contracting Parties that they have ratified it.

(b) Such modification or amendment shall thereafter enter into force as to any other Contracting Party when notice of ratification by it has been received by the depositary Government. Any such Contracting Party from which no notice of ratification is received within a period of two years from the date of entry into force of the modification or amendment in accordance with the provisions of subparagraph 1(a) of this Article shall be deemed to have withdrawn from the present Treaty on the date of the expiration of such period.

2. (a) If after the expiration of thirty years from the date of entry into force of the present Treaty, any of the Contracting Parties whose representatives are entitled to participate in the meetings provided for under Article IX so requests by a communication addressed to the depositary Government, a Conference of all the Contracting Parties shall be held as soon as practicable to review the operation of the Treaty.

(b) Any modification or amendment to the present Treaty which is approved at such a Conference by a majority of the Contracting Parties there represented, including a majority of those whose representatives are entitled to participate in the meetings provided for under Article IX, shall be communicated by the depositary Government to all the Contracting Parties immediately after the termination of the Conference and shall enter into force in accordance with the provisions of paragraph 1 of the present Article.

(c) If any such modification or amendment has not entered into force in accordance with the provisions of subparagraph 1(a) of this Article within a period of two years after the date of its communication to all the Contracting Parties, any Contracting Party may at any time after the expiration of that period give notice to the depositary Government of its withdrawal from the present Treaty; and such withdrawal shall take effect two years after the receipt of the notice by the depositary Government.

ARTICLE XIII

1. The present Treaty shall be subject to ratification by the signatory States. It shall be open for accession by any State which is a Member of the United Nations, or by any other State which may be invited to accede to the Treaty with the consent of all the Contracting Parties whose representatives are entitled to participate in the meetings provided for under Article IX of the Treaty.

2. Ratification of or accession to the present Treaty shall be effected by each State in accordance with its constitutional processes.

3. Instruments of ratification and instruments of accession shall be deposited with the Government of the United States of America, hereby designated as the depositary Government.

4. The depositary Government shall inform all signatory and acceding States of the date of each deposit of an instrument of ratification or accession, and the date of entry into force of the Treaty and of any modification or amendment thereto.

5. Upon the deposit of instruments of ratification by all the signatory States, the present Treaty shall enter into force for those States and for States which have deposited instruments of accession. Thereafter the Treaty shall enter into force for any acceding State upon the deposit of its instrument of accession.

6. The present Treaty shall be registered by the depositary Government pursuant to Article 102 of the Charter of the United Nations.

ARTICLE XIV

The present Treaty, done in the English, French, Russian and Spanish language, each version being equally authentic, shall be deposited in the archives of the Government of the United States of America, which shall transmit duly certified copies thereof to the Governments of the signatory and acceding States.

IN WITNESS WHEREOF, the undersigned Plenipotentiaries, duly authorized, have signed the present Treaty.

DONE at Washington this first day of December, one thousand nine hundred and fifty-nine.

For Argentina:

ADOLFO SCILINGO

F BELLO

For Australia:

HOWARD BEALE

For Belgium:

OBERT DE THIEUSIES

For Chile:

MARCIAL MORA M

E GAJARDO V

JULIO ESCUDERO

For the French Republic:

PIERRE CHARPENTIER

For Japan:

KOICHIRO ASAKAI

T. SHIMODA

For New Zealand:

G D L WHITE

For Norway:

PAUL KOHT

For the Union of South Africa:

WENTZEL C. DU PLESSIS

For the Union of Soviet Socialist Republics:

V. KUZNETSOV [Romanization]

For the United Kingdom of Great Britain and Northern Ireland:

HAROLD CACCIA

For the United States of America:

HERMAN PHLEGER

PAUL C. DANIELS

I CERTIFY THAT the foregoing is a true copy of the Antarctic Treaty signed at Washington on December 1, 1959 in the English, French, Russian, and Spanish languages, the signed original of which is deposited in the archives of the Government of the United States of America.

IN TESTIMONY WHEREOF, I, CHRISTIAN A. HERTER, Secretary of State of the United States of America, have hereunto caused the seal of the Department of State to be affixed and my name subscribed by the Authentication Officer of the said Department, at the city of Washington, in the District of Columbia, this second day of December, 1959.

[SEAL]

CHRISTIAN A. HERTER,

Secretary of State.

By BARBARA HARTMAN,

Authentication Officer, Department of State.

List of Nations which have ratified the Antarctic Treaty:

| <i>Nations</i> | <i>Dates of Ratification</i> |
|----------------------------|------------------------------|
| United States..... | August 18, 1960. |
| Argentina..... | June 23, 1961. |
| Australia..... | June 23, 1961. |
| Belgium..... | July 26, 1960. |
| Chile..... | June 23, 1961. |
| France..... | September 16, 1960. |
| Japan..... | August 4, 1960. |
| New Zealand..... | November 1, 1960. |
| Norway..... | August 24, 1960. |
| Union of South Africa..... | June 21, 1960. |
| U.S.S.R..... | November 2, 1960. |
| United Kingdom..... | May 31, 1960. |
| <i>Accessions</i> | <i>Dates of Accession</i> |
| Czechoslovakia..... | June 14, 1962. |
| Denmark..... | May 20, 1965. |
| Poland..... | June 8, 1961. |

UNITED NATIONS RESOLUTION 2130(XX), DECEMBER 21, 1965

INTERNATIONAL COOPERATION IN THE PEACEFUL USES OF OUTER SPACE

The General Assembly,

Recalling its resolution 1962 (XVIII) entitled "Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space" and resolution 1963 (XVIII) entitled "International Cooperation in the Peaceful Uses of Outer Space," both adopted unanimously on 13 December 1963,

Having considered the reports of the Committee on the Peaceful Uses of Outer Space,¹

Conscious that the benefits of space exploration can be most widely enjoyed if Member States support the widest possible exchange of information and promote international cooperation in this field.

I

Urges the Committee on the Peaceful Uses of Outer Space, in developing law for outer space, to continue with determination the preparation of draft international agreements on assistance to and return of astronauts and space vehicles and on liability for damage caused by objects launched into outer space, and to give consideration to incorporating in international agreement form, in the future as appropriate, legal principles governing the activities of States in the exploration and use of outer space;

II

1. *Endorses* the recommendations contained in the reports of the Committee on the Peaceful Uses of Outer Space concerning exchange of information, education and training, international sounding rocket launching facilities, potentially harmful effects of space experiments, and encouragement of international programmes;

2. *Welcomes* the intention of the Committee on the Peaceful Uses of Outer Space to continue its activities in the exchange of information on outer space matters by encouraging such means as the preparation of reviews on the activities and resources of various international organizations and bodies relating to the peaceful uses of outer space, on national and cooperative international space activities, on bibliographies and abstracting services, and on education and training;

3. *Notes with appreciation* that a number of Member States have, on a voluntary basis, co-operated extensively with the programme of the Committee on the Peaceful Uses of Outer Space by providing information on their space activities, and urges other Member States to do so;

4. *Supports* the request of the Committee on the Peaceful Uses of Outer Space that the Secretary-General disseminate on a continuing

¹ Official Records of the General Assembly, Nineteenth Session, Annexes, annex No. 10, document A/5785; A/6042.

basis information received from Member States on the needs and facilities for education and training in space-related subjects;

5. *Notes also with appreciation* that certain Member States have contributed to the goals of the Committee on the Peaceful Uses of Outer Space, as laid down in its reports, by establishing educational and training programmes, and urges other Member States to do so;

6. *Notes* the decision of the Committee on the Peaceful Uses of Outer Space to convene, on 18 January 1966, the Working Group established to examine the desirability, organization and objectives of an international conference or meeting to be held in 1967 on the exploration and peaceful uses of outer space, as well as to make recommendations on the question relating to the participation in that meeting of the appropriate international organizations;

7. *Accords* United Nations sponsorship to India for the continuing operation of the Thumba International Equatorial Sounding Rocket Launching Facility, which is eligible for such sponsorship and such assistance as may be requested in accordance with the basic principles endorsed by the General Assembly in its resolution 1802 (XVII) of 14 December 1962;

8. *Takes note* of the resolution adopted by the Committee on Space Research at its seventh session, held in May 1964, on the basis of the report of its Consultative Group on Potentially Harmful Effects of Space Experiments;

9. *Notes with appreciation* that, in accordance with General Assembly resolution 1721 (XVI) of 20 December 1961, the Secretary-General continues to maintain a public registry of objects launched into orbit or beyond on the basis of information being furnished by Member States;

10. *Notes with satisfaction* the growing measure of co-operation among many Member States in the peaceful exploration and use of outer space;

11. *Urges* that space activities be carried out in such a manner that States may share in the adventure and the practical benefits of space exploration irrespective of the stage of their economic or scientific development;

12. *Notes with appreciation* the progress reports submitted by the World Meteorological Organization² and the International Telecommunication Union³ on their activities in the field of outer space and invites these organizations to make progress reports to the Committee on the Peaceful Uses of Outer Space in 1966;

III

1. *Requests* the Committee on the Peaceful Uses of Outer Space, in co-operation with the Secretary-General and making use of the available resources of the Secretariat, and in consultation with the specialized agencies and in co-operation with the Committee on Space Research, to prepare and consider during its next session suggestions for programmes of education and training of specialists in the peaceful uses of outer space to assist the developing countries, and to report to the General Assembly at its twenty-first session;

2. *Requests* the Committee on the Peaceful Uses of Outer Space to continue its work as set forth in this and previous General Assembly resolutions and to report to the Assembly at its twenty-first session.

² Transmitted under the symbol A/AC.105/L.19.

³ Transmitted under the symbol E/4037/Add.1.

MOON EXPLORATION: U.S. RECORD—NOVEMBER 1958—MAY 1966

| Mission | Launch date | Place of launch | Launch vehicle | Weight (pounds) spacecraft | Results |
|----------------|----------------|-----------------|----------------|----------------------------|--|
| Pioneer II | Nov. 8, 1958 | ETR | Thor-Able I | 86.4 | Scientific-lunar probe: 3d-stage failure; reached 963 miles; its brief data indicated equatorial region had higher flux and energy levels than previously thought. |
| Pioneer IV | Mar. 3, 1959 | ETR | Juno II | 13.4 | Cislunar and lunar probe: Energetic particles, passed 36,300 miles from the moon on Mar. 4, 1959. |
| Pioneer (P-3) | Nov. 26, 1959 | ETR | Atlas-Able | 372 | Lunar orbiter: Shroud failure after 45 seconds. |
| Pioneer (P-30) | Sept. 25, 1960 | ETR | do | 387 | Scientific lunar orbiter: 2d-stage failure. |
| Pioneer (P-31) | Dec. 15, 1960 | ETR | do | 388 | Scientific lunar orbiter: Exploded after 74 seconds. |
| Ranger I | Aug. 23, 1961 | ETR | Atlas-Agena | 675 | Lower earth orbit than planned. Remarkable performance of instruments in environment for which they were not designed. Good information on particles and fields. |
| Ranger II | Nov. 18, 1961 | ETR | do | 675 | Agena failed to restart. Obtained cislunar particle and fields measurements. |
| Ranger III | Jan. 26, 1962 | ETR | Atlas-Agena B | 727 | Passed moon at 22,862 miles, Jan. 28, 1962. Now in sun orbit. TV and hard instrumented landing had been planned. |
| Ranger IV | Apr. 23, 1962 | ETR | do | 730 | TV and hard instrumented landing planned. Lost control 2 hours after launch. Lunar impact on far side. |
| Ranger V | Oct. 18, 1962 | ETR | do | 755 | TV and hard instrumented landing planned. Power loss—no pictures. Passed 450 miles from moon, Oct. 20, 1962. Now in sun orbit. |
| Ranger VI | Jan. 30, 1964 | ETR | Atlas-Agena | 804 | Approach TV and hard landing planned. Impact point within 20 statute miles of |

| | | | | | |
|-------------|---------------|-----|---------------|---------------------------------------|--|
| Ranger VII | July 28, 1964 | ETR | do | 806 | target on west edge of Sea of Tranquility. TV system failed to operate. |
| Ranger VIII | Feb. 17, 1965 | ETR | do | 804 | Photographic lunar exploration planned. Obtained 4,316 high resolution TV pictures with about 2,000 times better definition than present earth-based photography. Objects less than 3 feet discernible. Impact in Sea of Clouds within about 8 miles of aim point. |
| Ranger IX | Mar. 21, 1965 | ETR | do | 807 | Lunar photography—7,137 pictures obtained. Impact about 15 miles from target in Sea of Tranquility. |
| Surveyor I | May 30, 1966 | ETR | Atlas-Centaur | 2,194 (at launch) 596 (at landing) | Lunar photography—5,814 pictures obtained. Impact less than 3 miles from target in eastern floor of crater of Alphonsus. Pictures converted for live commercial TV viewing. Final mission in Ranger series. |
| | | | | | Achieved soft lunar landing on 1st engineering test flight (with closed loop guidance) at 2:17 eastern daylight time, June 2, 1966, in Ocean of Storms (241° S., 43, 43° W.). Data was obtained on topography, texture, and structure which will permit geological interpretation of lunar surface morphology and processes of formation. Bearing strength of Surveyor I site and footpad scale about 5 pounds per square inch. Surface material is small cohesive particles with rocks up to 3 feet in size. No loose dust. More than 10,300 pictures taken during first lunar day. Equipment survived lunar night and operated during 2d lunar day taking approximately 900 additional pictures. Surveyor I is 1st occasion where a measurable force has been applied on the moon and a measured response has been received. |

MOON EXPLORATION: U.S.S.R. RECORD—JANUARY 1959—MARCH 1966

| Name | Launch | Down | Weight (pounds) | Results |
|--------------------|----------------|------------------------------|--------------------------|---|
| 1959: | | | | |
| Luna I----- | Jan. 2, 1959 | Solar orbit----- | 3,245.0 (T) 800.0 (1) | First interplanetary probe. |
| Luna II----- | Sept. 12, 1959 | Sept. 13, 1959 (L)----- | 858.4 | 1st lunar impact (35 hours). Cislunar physics. |
| Luna III----- | Oct. 4, 1959 | Mar. 20, 1960 (approximate). | 4,037.0 (T) 614.0 (1) | Photographed 70 percent of moon's far side. Last stage earth orbited 345-pound instrument package. |
| 1963: Luna IV----- | Apr. 2, 1963 | Barycentric----- | 3,135.0 (1) | Jodrell Bank reported midflight maneuvers; soft landing believed attempted; missed moon by 4,600 nautical miles after approximately 86½ hours. |
| 1965: | | | | |
| Luna V----- | May 9, 1965 | May 11, 1965 (L)----- | 3,250.0 | Lunar exploration: Lunar soft landing attempt of an "automatic station" equipped "with various measuring apparatus for conducting scientific research." (Tass.) Signals ceased abruptly possibly indicating a crash landing. Total flight time to impact: approximately 60 hours. |
| Luna VI----- | June 8, 1965 | Solar orbit----- | 3,179 | Midcourse engine malfunction spoiled lunar soft landing attempt, missed moon by 100,000 miles. |
| Luna VII----- | Oct. 4, 1965 | Oct. 7, 1965----- | 3,318 | Impacted on moon; retrorockets fired early, soft landing failed. |
| Luna VIII----- | Dec. 3, 1965 | Dec. 6, 1965----- | 3,422 | Do. |

| | | | | |
|--------------|---------------|-------------------------------|-------|--|
| 1966: | | | | |
| Luna IX----- | Jan. 31, 1966 | Feb. 3, 1966 (lunar landing). | 1,220 | Lunar exploration: 1st successful lunar landing (after 4 announced attempts) in eastern edge of Ocean of Storms. TV system with 360° field provided several pictures showing craters small as several centimeters, blocky surface projections in the 1 to 10 centimeter range; no loose dust was visible; bearing strength estimated to exceed 1 pound per square inch. Other sensors indicated a very low level of radioactivity. Surface lifetime: 45 hours, 56 minutes. |
| Luna X----- | Mar. 31, 1966 | Lunar orbit----- | 540 | Lunar exploration: 1st spacecraft placed in "lunar orbit"; "to test a system insuring the setting up of an artificial moon satellite, with object of exploring near lunar outer space * * *." Orbit about 190 by 63 nautical miles. |

¹ Instrumented payload.

Sources: Satellite Situation Report, astronautics and aeronautics reports, TRW Space Log and others.

Legend: (R) Recovered; (T) Total weight orbited; (1) Instrumentation weight; (N.D.) Not Disclosed; (L) Lunar impact.

This list includes all Soviet lunar launches reported by the U.S.S.R. There might have been other Soviet attempts which did not achieve a lunar trajectory.

MEMBERS OF THE UNITED NATIONS COMMITTEE ON THE PEACEFUL USES OF OUTER SPACE¹

- | | |
|--|--|
| <ol style="list-style-type: none"> 1. Albania 2. Argentina 3. Australia 4. Austria 5. Belgium 6. Brazil 7. Bulgaria 8. Canada 9. Chad 10. Czechoslovakia 11. France 12. Hungary 13. India 14. Iran | <ol style="list-style-type: none"> 15. Italy 16. Japan 17. Lebanon 18. Mexico 19. Mongolia 20. Morocco 21. Poland 22. Rumania 23. Sierra Leone 24. Sweden 25. U.S.S.R. 26. United Arab Republic 27. United Kingdom 28. United States |
|--|--|

¹ The same nations are represented on the Committee's two subcommittees: the Legal Subcommittee and the Scientific and Technical Subcommittee.

PREVIOUS PUBLICATIONS OF THE COMMITTEE ON INTERNATIONAL SPACE ACTIVITIES¹

1. Radio Frequency Control in Space Telecommunications. By Edward Wenk Jr. Committee print. 86th Congress, 2d session. March 19, 1960. 235 p.
2. Policy Planning for Space Telecommunications. Staff Report. Committee print. 86th Congress, 2d session. December 4, 1960. 207 p.
3. Legal Problems of Space Exploration: A Symposium. By Eilene Galloway. Senate Document No. 26. 87th Congress, 1st session. March 22, 1961. 1392 p.
4. Communication Satellites: Technical, Economic, and International Developments. Staff Report. Committee print. 87th Congress, 2d session. February 25, 1962. 287 p.
5. Soviet Space Programs: Organization, Plans, Goals, and International Implications. Staff Report. Committee print. 87th Congress, 2d session. May 31, 1962. 399 p.
6. Documents on International Aspects of the Exploration and Use of Outer Space, 1954-1962. Staff Report. Senate Document No. 18. 88th Congress, 1st session. May 9, 1963. 407 p.
7. United States International Space Programs: Texts of Executive Agreements, Memoranda of Understanding, and Other International Arrangements, 1959-1965. Edited by Eilene Galloway. Senate Document No. 44. 89th Congress, 1st session. July 30, 1965. 575 p.
8. International Cooperation and Organization for Outer Space. By Eilene Galloway. Senate Document No. 56. 89th Congress, 1st session. August 12, 1965. 580 p.

¹ Publications Nos. 3-8 are available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402. Only a limited supply of Nos. 1 and 2 are available from the committee.