

Distr.: Limited 10 June 2016

Original: English

**Committee on the Peaceful Uses of Outer Space Fifty-ninth session** Vienna, 8-17 June 2016

# Draft report

# Chapter I

### Introduction

1. The Committee on the Peaceful Uses of Outer Space held its fifty-ninth session in Vienna from 8 to 17 June 2016. The officers of the Committee were as follows:

| Chair:                        | David Kendall (Canada)            |
|-------------------------------|-----------------------------------|
| First Vice-Chair:             | Vladimir Galuska (Czech Republic) |
| Second Vice-Chair/Rapporteur: | Omar Shareef Hamad Eisa (Sudan)   |

## A. Meetings of subsidiary bodies

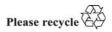
2. The Scientific and Technical Subcommittee of the Committee on the Peaceful Uses of Outer Space held its fifty-third session in Vienna from 15 to 26 February 2016, under the chairmanship of V. K. Dadhwal (India). The report of the Subcommittee was before the Committee (A/AC.105/1109).

3. The Legal Subcommittee of the Committee on the Peaceful Uses of Outer Space held its fifty-fifth session in Vienna from 4 to 15 April 2016, under the chairmanship of Hellmut Lagos Koller (Chile). The report of the Subcommittee was before the Committee (A/AC.105/1113).

## **B.** Adoption of the agenda

- 4. At its opening meeting, the Committee adopted the following agenda:
  - 1. Opening of the session.

V.16-03435 (E)



- 2. Adoption of the agenda.
- 3. Election of officers.
- 4. Statement by the Chair.
- 5. General exchange of views.
- 6. Ways and means of maintaining outer space for peaceful purposes.
- 7. Report of the Scientific and Technical Subcommittee on its fifty-third session.
- 8. Report of the Legal Subcommittee on its fifty-fifth session.
- 9. Space and sustainable development.
- 10. Spin-off benefits of space technology: review of current status.
- 11. Space and water.
- 12. Space and climate change.
- 13. Use of space technology in the United Nations system.
- 14. Future role of the Committee.
- 15. Other matters.
- 16. Report of the Committee to the General Assembly.

#### C. Election of officers

5. At the 706th meeting of the Committee, on 8 June, David Kendall (Canada) was elected Chair of the Committee, Vladimir Galuska (Czech Republic) was elected First Vice-Chair and Omar Shareef Hamad Eisa (Sudan) was elected Second Vice-Chair/Rapporteur for 2016 and 2017.

6. At the same meeting, the Committee endorsed the election of V. K. Dadhwal (India) as Chair of the fifty-third session of the Scientific and Technical Subcommittee, Chiaki Mukai (Japan) as Chair of the fifty-fourth session of that Subcommittee and Hellmut Lagos Koller (Chile) as Chair of the Legal Subcommittee for a two-year term of office, starting with the sessions of the Subcommittees held in 2016.

#### D. Membership

7. In accordance with General Assembly resolutions 1472 A (XIV), 1721 E (XVI), 3182 (XXVIII), 32/196 B, 35/16, 49/33, 56/51, 57/116, 59/116, 62/217, 65/97, 66/71 and 68/75 and decisions 45/315, 67/412, 67/528 and 70/518 the Committee on the Peaceful Uses of Outer Space was composed of the following 83 States: Albania, Algeria, Argentina, Armenia, Australia, Austria, Azerbaijan, Belarus, Belgium, Benin, Bolivia (Plurinational State of), Brazil, Bulgaria, Burkina Faso, Cameroon, Canada, Chad, Chile, China, Colombia, Costa Rica, Cuba, Czech Republic, Ecuador, Egypt, El Salvador, France, Germany, Ghana, Greece, Hungary, India, Indonesia, Iran (Islamic Republic of), Iraq, Israel, Italy, Japan, Jordan, Kazakhstan, Kenya, Lebanon,

Libya, Luxembourg, Malaysia, Mexico, Mongolia, Morocco, Netherlands, Nicaragua, Niger, Nigeria, Oman, Pakistan, Peru, Philippines, Poland, Portugal, Qatar, Republic of Korea, Romania, Russian Federation, Saudi Arabia, Senegal, Sierra Leone, Slovakia, South Africa, Spain, Sri Lanka, Sudan, Sweden, Switzerland, Syrian Arab Republic, Thailand, Tunisia, Turkey, Ukraine, United Arab Emirates, United Kingdom of Great Britain and Northern Ireland, United States of America, Uruguay, Venezuela (Bolivarian Republic of) and Viet Nam.

#### E. Attendance

8. Representatives of the following [...] States members of the Committee attended the session: Albania, Algeria, Argentina, Armenia, Australia, Australia, Azerbaijan, Belarus, Belgium, Bolivia (Plurinational State of), Brazil, Bulgaria, Burkina Faso, Canada, Chile, China, Colombia, Costa Rica, Cuba, Czech Republic, Ecuador, Egypt, El Salvador, France, Germany, Greece, Hungary, India, Indonesia, Iran (Islamic Republic of), Israel, Italy, Japan, Kenya, Luxembourg, Mexico, Morocco, Netherlands, Nicaragua, Nigeria, Oman, Pakistan, Peru, Philippines, Poland, Portugal, Qatar, Republic of Korea, Romania, Russian Federation, Saudi Arabia, Slovakia, South Africa, Spain, Sri Lanka, Sudan, Sweden, Switzerland, Syrian Arab Republic, Thailand, Tunisia, Turkey, Ukraine, United Arab Emirates, United Kingdom, United States, Venezuela (Bolivarian Republic of) and Viet Nam.

9. At its 706th meeting, on 8 June, the Committee decided to invite, at their request, observers for Cyprus, the Dominican Republic, New Zealand and Panama, as well as the Holy See, to attend its fifty-ninth session and to address it, as appropriate, on the understanding that it would be without prejudice to further requests of that nature and that it would not involve any decision of the Committee concerning status.

10. At the same meeting, the Committee decided to invite, at the request of the Sovereign Military Order of Malta, the observer for that organization to attend the session and to address it, as appropriate, on the understanding that it would be without prejudice to further requests of that nature and that it would not involve any decision of the Committee concerning status.

11. Also at the same meeting, the Committee decided to invite, at the request of the European Union, the observer for that organization to attend the session, in accordance with General Assembly resolution 65/276, entitled "Participation of the European Union in the work of the United Nations", and to address it, as appropriate, on the understanding that it would be without prejudice to further requests of that nature and that it would not involve any decision of the Committee concerning status.

12. Observers for the Office for Disarmament Affairs of the Secretariat and the International Telecommunication Union (ITU) attended the session.

13. The session was attended by observers for the following intergovernmental organizations with permanent observer status with the Committee: Asia-Pacific Space Cooperation Organization (APSCO), European Southern Observatory (ESO), European Space Agency (ESA), European Telecommunications Satellite Organization (EUTELSAT-IGO), International Mobile Satellite Organization, Inter-Islamic

4

Network on Space Sciences and Technology (ISNET) and International Telecommunications Satellite Organization.

14. The session was also attended by observers for the following non-governmental organizations with permanent observer status with the Committee: Association of Space Explorers (ASE), European Space Policy Institute (ESPI), International Association for the Advancement of Space Safety (IAASS), International Astronautical Federation (IAF), International Institute of Space Law (IISL), Prince Sultan bin Abdulaziz International Prize for Water (PSIPW), Secure World Foundation (SWF), Space Generation Advisory Council (SGAC) and World Space Week Association (WSWA).

15. At its 706th meeting, the Committee decided to invite, at the request of the International Air Transport Association (IATA), the observer for that organization to attend its fifty-ninth session and to address it, as appropriate, on the understanding that it would be without prejudice to further requests of that nature and that it would not involve any decision of the Committee concerning status.

16. A list of representatives of States members of the Committee, States not members of the Committee, United Nations entities and other organizations attending the session is contained in A/AC.105/2016/INF/1.

#### F. General statements

Statements were made by representatives of the following States members of 17. the Committee during the general exchange of views: Algeria, Argentina, Austria, Brazil, Canada, China, Colombia, Costa Rica, Cuba, Czech Republic, Ecuador, Egypt, El Salvador, France, Germany, India, Indonesia, Iran (Islamic Republic of), Israel, Italy, Japan, Mexico, Morocco, New Zealand, Nigeria, Pakistan, Poland, Republic of Korea, Romania, Russian Federation, Slovakia, South Africa, Sri Lanka, Sudan, Sweden, Switzerland, Syrian Arab Republic, Thailand, United Kingdom, United States and Venezuela (Bolivarian Republic of). Statements were also made by the representative of Argentina on behalf of the Group of 77 and China, by the representative of the European Union, by the representative of the Dominican Republic on behalf of the Group of Latin American and Caribbean States and by the representative of the Sudan on behalf of the African Group. The observers for the African Association of Remote Sensing of the Environment, APSCO, ESA, ESO, EUTELSAT-IGO, IAF, IATA, SGAC, SWF and WSWA also made statements.

18. The Committee welcomed the election of David Kendall (Canada) as its Chair, Vladimir Galuska (Czech Republic) as its First Vice-Chair and Omar Shareef Hamad Eisa (Sudan) as its Second Vice-Chair/Rapporteur of the Committee for the period 2016-2017.

19. The Committee expressed its appreciation to Azzedine Oussedik (Algeria), the outgoing Chair, Diego Stacey Moreno and Rosa Olinda Vásquez Orozco (Ecuador), the outgoing First Vice-Chairs, and Samir S. Mohammed Raouf (Iraq) and Xinmin Ma (China), the outgoing Second Vice-Chairs/Rapporteurs, for their excellent work and achievements during their terms of office.

20. At the 706th meeting, the Chair delivered a statement highlighting various cross-cutting areas in the work of the Committee, its Subcommittees and the Office for Outer Space Affairs of the Secretariat that posed opportunities for more effectively addressing current challenges in outer space. He stressed the need for the members of the Committee to work together in order to find constructive, consensual solutions to important issues relating to the mandate of the Committee. Such issues included improving the safety and security of the space environment for its use by all States, contributing to a healthy and essential debate on the major treaties, agreements and conventions in order to reflect the current global space situation and, specifically, assisting States in benefiting from the utilization of space, irrespective of the stage of their economic or scientific and technical development. The Chair also noted the importance of UNISPACE+50 as an opportunity for steering the way toward strengthening the Committee's mandate to more effectively address current challenges and opportunities in the area of enhanced international cooperation in the peaceful uses of outer space.

21. At the same meeting, the Director of the Office for Outer Space Affairs made a statement in which she reviewed the work carried out by the Office during the previous year, including outreach activities and cooperation and coordination with United Nations entities and international intergovernmental and non-governmental organizations. The Director highlighted the role of the Office in discharging the responsibilities of the Secretary-General under the United Nations treaties on outer space and in maintaining the Register on Objects Launched into Outer Space under the obligations set out in the Convention on Registration of Objects Launched into Outer Space. The Register was the Convention's core mechanism for creating transparency and building confidence in outer space activities. She also described the Office's work in coordinating activities among United Nations entities in the areas of sustainable development, global health, emerging issues in commercial space transportation and regulatory aspects of small satellites as examples of the successful implementation of the mandate of the Office to lead the Inter-Agency Meeting on Outer Space Activities (UN-Space). She highlighted the current, unfavourable financial situation of the Office and stressed the importance of the availability of financial and other resources for the successful implementation of its programme of work. The situation required addressing its human resources shortfall, and the Director called on Member States to consider supplementing the Office's regular budget with extrabudgetary resources, both monetary and in kind.

22. At its 710th meeting, on 10 June 2016, the Committee invited the Director-General of the United Nations Office at Vienna and Executive Director of the United Nations Office on Drugs and Crime, Yury Fedotov, to make a statement. He highlighted that space tools and space-derived information could play a transformative role in helping countries achieve the Sustainable Development Goals, and that the Office for Outer Space Affairs was an essential partner in those global efforts. He emphasized the importance of space-based technology and Earth observation for disaster management and emergency response, which was reinforced by the Sendai Framework for Disaster Risk Reduction 2015-2030. He also drew attention to the United Nations Platform for Space-based Information for Disaster Management and Emergency Response (UN-SPIDER), the tenth anniversary of which was taking place in 2016. The Director-General expressed his commitment to supporting the Director of the Office for Outer Space Affairs in fostering the Committee as a unique global platform to promote international cooperation in the peaceful exploration and use of outer space.

23. The Committee heard statements by heads and senior managers of the national space agencies of France, Italy and the United States, during which they conveyed to the Committee the major highlights of the work of those agencies to address the global problems of humanity through the use of space technologies, national coordinated efforts and regional and international cooperation.

24. The Committee heard the following presentations:

(a) "Follow-up on COP21: Space endeavour towards climate and growth" by the representative of France;

(b) "Information platform on objects and events in space", by the representative of the Russian Federation;

(c) "Student activities in space: nanosatellites, experimental rockets and mission to the Moon", by the representative of Austria;

(d) "Regional Centre for Space Science and Technology Education in Asia and Pacific (China) website and its working progress", by the representative of China;

(e) "The International Mars Analogue Research Programme of the Austrian Space Forum", by the representative of Austria;

(f) "Italian contribution to Space Exploration through ALTEC", by the representative of Italy;

(g) "SGAC: 17 years since UNISPACE III", by the observer of SGAC;

(h) "KiboCUBE: UNOOSA/JAXA cooperation programme on the deployment of CubeSat from the ISS 'Kibo'", by the representative of Japan;

(i) "Journey to Mars via global space collaboration", by the representative of the United States;

(j) "China manned space programme: its achievements and future developments", by the representative of China;

(k) "A well-rounded approach to the global dimension of space: ASI-SIOI-ISGI-CNR master's course in institutions and space policies", by the representative of Italy;

(l) "ASTROSAT: India's space-based astronomical observatory", by the representative of India.

25. The Committee noted with appreciation the holding on the margins of the session the symposium entitled "Looking to the future: changing international relations and legal issues facing space activities" by the Faculty of Law of the University of Vienna, organized by Austria.

26. The view was expressed that the continued attempts by the Democratic People's Republic of Korea to legitimize its ballistic missile-related programme as a peaceful space activity was highly regrettable. The delegation expressing that view reiterated that the Security Council, in its resolution 2270 (2016), had prohibited the

country from engaging in any form of technical cooperation with other Member States on launches using ballistic missile technology.

27. Some delegations expressed the view that the Committee played a leading role in regulating space exploration through its two Subcommittees and that it remained the appropriate forum for discussion and cooperation among States in order to ensure the continued peaceful exploration and use of outer space.

28. Some delegations reaffirmed the commitment of their countries to the peaceful use and exploration of outer space and emphasized the following principles: universal and equal access to outer space for all countries without discrimination, regardless of their level of scientific, technical and economic development, as well as the equitable and rational use of outer space for the benefit of all humankind; non-appropriation of outer space, including the Moon and other celestial bodies, by claim of sovereignty, use, occupation or any other means; non-militarization of outer space, which should never be used for the installation of weapons of any kind, and, as a common heritage of humankind, its strict use for the improvement of living conditions and peace among the peoples inhabiting our planet; international responsibility of States for their national space activities; and regional cooperation to promote space activities, as established by the General Assembly and other international forums.

29. Some delegations expressed the view that transparency and confidencebuilding measures could make an important contribution to the security, safety and sustainability of activities in outer space. To that end, the draft international code of conduct for outer space activities was intended to be an instrument that promoted an increase in international cooperation in space, established standards of responsible behaviour across the full range of space activity, contained commitments to the principle of non-interference in the peaceful exploration and use of outer space and facilitated equitable access to outer space. The delegations expressing that view were also of the view that such a non-legally binding agreement should be negotiated within the United Nations.

30. The view was expressed that an open national information service that provided foreign participants in space activities with information on objects and events in near-Earth outer space would demonstrate States' commitment to a policy of openness and transparency. The delegation expressing that view was also of the view that such a service could be operated as a United Nations information platform and, in addition to possibly giving greater space situational awareness, would also constitute the implementation of a key transparency and confidence-building measure.

#### G. Adoption of the report of the Committee

31. After considering the various items before it, the Committee, at its [...] meeting, on [...] June 2016, adopted its report to the General Assembly containing the recommendations and decisions set out below.

# **Chapter II**

# **Recommendations and decisions**

### A. Ways and means of maintaining outer space for peaceful purposes

32. In accordance with paragraph 13 of General Assembly resolution 70/82, the Committee continued its consideration, as a matter of priority, of ways and means of maintaining outer space for peaceful purposes and its consideration of the broader perspective of space security and associated matters that would be instrumental in ensuring the safe and responsible conduct of space activities, including ways to promote international, regional and interregional cooperation to that end.

33. The representatives of Canada, Japan, Pakistan, the Russian Federation, South Africa, the United States and Venezuela (Bolivarian Republic of) made statements under the item. During the general exchange of views, statements relating to the item were also made by other member States. The Committee heard a presentation entitled "Space Security Index", by the representative of Canada.

34. Some delegations expressed the view that the report of the Group of Governmental Experts on Transparency and Confidence-Building Measures in Outer Space Activities (A/68/189) and General Assembly resolution 69/38, in which the Assembly encouraged Member States to continue to review and implement, to the greatest extent practicable, the proposed transparency and confidence-building measures contained in that report, provided a solid basis for States to share information and improve mutual understanding of their activities in outer space and would help prevent military confrontation and foster regional and global stability.

35. Some delegations expressed the view that the existing legal regime with respect to outer space was not sufficient to prevent the placement of weapons in outer space or to address issues concerning the space environment, and that it was important to further develop international space law in order to maintain outer space for peaceful purposes. Those delegations were of the view that, in order to ensure that outer space was used peacefully and to prevent its militarization, the preparation of binding international legal instruments was necessary.

36. Some delegations expressed the view that, in order to maintain the peaceful nature of space activities and prevent the placement of weapons in outer space, it was essential for the Committee to encourage greater cooperation and linkages across the United Nations system, such as with the First Committee of the General Assembly and the Conference on Disarmament. Those delegations were also of the view that the Committee had a duty to suggest, recommend and generate synergies with those bodies, with a view to formulating an approach to ways and means of maintaining outer space for peaceful purposes. The view was expressed that in recognizing States' diverging views as to what constituted "exclusively peaceful purposes" within the meaning of the Outer Space Treaty, States should be invited to present their views on how the exploration and use of outer space for exclusively peaceful purposes was to be understood, functionally and practically. The delegation expressing that view was also of the view that defining what activities were in conformity with a commonly agreed definition of "exclusively peaceful purposes"

would also likely resolve the legal grounds on which the right to self-defence in outer space might be invoked.

37. The view was expressed that the Committee had been created exclusively to promote international cooperation with respect to the peaceful uses of outer space and that disarmament issues were more appropriately dealt with in other forums, such as the First Committee and the Conference on Disarmament. The delegation expressing that view was also of the view that no actions by the Committee were needed regarding the weaponization of outer space and that there was no scarcity of appropriate multilateral mechanisms under which disarmament could be discussed.

38. The view was expressed that the Committee could have a role in reviewing the implementation of specific unilateral, bilateral, regional and multilateral transparency and confidence-building measures in outer space, as well as in discussing new ones.

39. The Committee noted with satisfaction continuous developments in a number of cooperative endeavours that were being pursued at the international, regional and interregional levels by various actors, such as States and international intergovernmental and non-governmental organizations, and emphasized that such cooperation was essential for strengthening the peaceful uses of outer space and for assisting States in the development of their space capabilities. In that regard, the Committee noted the important role that bilateral and multilateral agreements played in promoting common space exploration objectives and cooperative and complementary space exploration missions.

40. Some delegations expressed the view that the United Nations was essential for strengthening and developing cooperation and collaboration among countries, in particular with regard to scientific and space technology, and for maximizing space resources for common prosperity, security and the long-term sustainability of outer space activities. The delegations expressing that view were also of the view that solid cooperation should enhance information-sharing and technical cooperation among countries in line with the principles of friendship, equal partnership and mutual respect.

41. The Committee noted with appreciation that the sixth African Leadership Conference on Space Science and Technology for Sustainable Development had been held in Sharm el-Sheikh, Egypt, from 1 to 4 December 2015 and that the Conference had discussed the African Space Policy and Strategy, which had subsequently been adopted by the African Union.

42. The Committee recalled the Pachuca Declaration, adopted by the Sixth Space Conference of the Americas, held in Pachuca, Mexico, from 15 to 19 November 2010, pursuant to which a regional space cooperation mechanism for the near future had been developed and, inter alia, an advisory group of space experts had been created. The Committee noted that the pro tempore secretariat of the Seventh Space Conference of the Americas was continuing the implementation of the Pachuca Declaration. The Committee noted with satisfaction that the Seventh Space Conference of the Americas had been successfully held in Managua from 17 to 19 November 2015, and had resulted in the adoption of the Managua Declaration and its action plan. The Committee noted that the Government of the Bolivarian Republic of Venezuela had expressed its willingness to host the Eighth Space Conference of the Americas. 43. The Committee noted with satisfaction that the twenty-second session of the Asia-Pacific Regional Space Agency Forum had been successfully held in Bali, Indonesia, from 1 to 4 December 2015, under the theme "Sharing solutions through synergy in space". The Committee noted that the twenty-third session would be held in Manila from 15 to 18 November 2016.

44. Some delegations expressed the view that the Committee played a crucial role in promoting cooperation among States in space activities and that the Committee provided a unique forum for States to exchange information in that regard. Those delegations also expressed the view that there were tangible opportunities to further enhance international cooperation, in accordance with the Committee's mandate.

45. The Committee agreed that, through its work in the scientific, technical and legal fields, as well as through the promotion of international dialogue and exchange of information on various topics relating to the exploration and use of outer space, it had a fundamental role to play in enhancing transparency and confidence-building among States, as well as in ensuring that outer space was maintained for peaceful purposes.

46. The Committee recommended that at its sixtieth session, in 2017, consideration of the item on ways and means of maintaining outer space for peaceful purposes should be continued, on a priority basis.

V.16-03435