### Contribution by Belgium to the general exchange of views on potential legal models for activities in the exploration, exploitation and utilization of space resources

- 1. Belgium welcomes the establishment of the Working Group on Legal Aspects of Space Resource Activities as decided at the sixtieth session of the Legal Subcommittee, in August 2021. That decision confirmed the willingness of the members of the Committee on the Peaceful Uses of Outer Space to work towards a multilateral solution that would help to prevent conflicts related to space resources and ensure the equitable, safe and sustainable use of such resources.
- 2. In line with the five-year workplan agreed in 2022, the Working Group will now start its substantive work. At this stage, Belgium would like to recall the joint statement made by several States parties to the Agreement Governing the Activities of States on the Moon and Other Celestial Bodies (Moon Agreement) on the benefits of adherence to that Agreement (A/AC.105/C.2/2008/CRP.11). As far as Belgium is concerned, that statement remains quite relevant at the present time, for several reasons:
  - Firstly, it highlights the only international legal instrument that addresses the issue of the exploitation of natural resources of the Moon and other celestial bodies going beyond the traditional concepts of "exploration" and "use" of outer space and thereby complements the Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, including the Moon and Other Celestial Bodies (Outer Space Treaty).
  - Secondly, the Moon Agreement provides the only existing international legal framework allowing such exploitation for the benefit of all nations, in full compliance with the Outer Space Treaty.
  - Thirdly, in addition to addressing the exploitation of natural resources, the Moon Agreement sets out valuable legal principles governing other activities on celestial bodies of the solar system. These principles concern the sharing of results of scientific missions and the establishment and operation of ground stations on the Moon or other celestial bodies.
- 3. Despite the fact that only a limited number of States are parties to the Moon Agreement, those States parties remain bound by the obligation to undertake to negotiate an international regime governing the exploitation of the natural resources of the Moon and other celestial bodies in line with the main purposes of such a regime as set out in article 11, paragraph 7, of the Agreement. Accordingly, we hope that discussions in the Working Group will provide an opportunity to better assess the principles of the Moon Agreement and to acknowledge its merits.
- 4. Since the topic of space resources was included in the agenda of the Legal Subcommittee at the request of Belgium in 2015, delegations have expressed different views on how best to approach that topic. It seems that these divergent views can be broadly translated into two different approaches to a legal or policy framework governing the natural resources of celestial bodies and the exploration, use and exploitation of such resources.

## First approach: develop a framework primarily on the basis of unilateral instruments

5. This is the approach adopted by several States which have developed national legislation on the organization and regulation of activities concerning the exploitation of natural resources originating from asteroids and other celestial bodies. Such legislation may serve as the basis for further development through bilateral instruments with other States. Under this approach, access to and the use and exploitation of space resources are elements of broader scientific or industrial cooperation between like-minded countries. On the one hand, such an approach can

be considered effective to the extent that it is project-driven and based on mutual consensus, allowing the smooth and rapid development of legal and policy instruments. On the other hand, such an arrangement among a small number of countries may stand in the way of a broader agreement with other countries and thus runs the risk of increasing the political and economic divide between those who are "in" and those who are "out". In particular, this approach might be seen as a potential obstacle to achieving consensus on international legal principles governing the exploitation of natural resources and to the establishment of more open, multilateral cooperation among States and non-governmental entities.

- 6. Furthermore, Belgium is of the view that this "club-based" model does not comply with the principles of the Outer Space Treaty and with international customary law, in that:
  - It does not provide any guarantee with respect to the equitable sharing of the benefits derived from space resources among all nations, including emerging spacefaring countries and developing countries; it is also based on the assumption that, despite article II of the Outer Space Treaty, there is a territorial basis for the direct application of national laws to determine the legal status of outer space, celestial bodies and their resources, and that States are entitled to allow the appropriation of such bodies and resources.
  - This interpretation would render article II of the Outer Space Treaty largely meaningless. It would also considerably reduce the scope of article I of the Treaty, since the benefits of the exploration and use of outer space are most clearly related to natural resources, be they material (e.g. mineral) or immaterial (e.g. orbital slots).
- 7. The "club-based" model has been used in the past, notably for Antarctica. Despite the sensitive context that characterized the Cold War, States succeeded in setting up an institutional and legal regime governing the Antarctic environment, outside the framework of the United Nations, on the basis of three main principles:
  - The suspension of all claims of territorial sovereignty over Antarctic areas
  - The recognition of Antarctica as an area dedicated primarily to scientific research and scientific cooperation
  - The prohibition of military activities in Antarctica
- 8. The Antarctic Treaty System is based on recognition of the role of nations active in Antarctica as leading parties, although it does not exclude non-active nations from consultation. Recognition of a similar active role in the exploration and the use of celestial bodies can be found in article 11, paragraph 7 (d), of the Moon Agreement.
- 9. Belgium nevertheless does see some merit in the existing instruments and proposals developed by nations involved or interested in space resource exploitation. For instance, Belgium recognizes that the Artemis Accords on the Principles for Cooperation in the Civil Exploration and Use of the Moon, Mars, Comets, and Asteroids for Peaceful Purposes point to some important issues that should be considered with respect to regulation of the exploration, use and exploitation of lunar resources, while reflecting the unique experience of the United States of America in bringing humans to the Moon. This is also true of other contributions from non-governmental actors or think tanks. All those initiatives can usefully contribute to the reflections of the Working Group.

# Second approach: provide a legal or policy framework for space resource activities that is based on an open multilateral system in which all States are invited to participate and contribute to decision-making

10. This approach allows the involvement of all countries willing to establish a legal, economic and/or operational model compliant with existing international law, in particular the Outer Space Treaty. It guarantees the genuine legitimacy of the systems used to allocate the benefits derived from space resources and is therefore

likely to mitigate rather than increase the risk of international conflicts. It also allows all those States that have ratified the Moon Agreement to negotiate an international regime for exploitation of the natural resources of celestial bodies. Lastly, it provides legal security to investors by ensuring that economic rights are acknowledged at the global level.

- 11. At the same time, Belgium recognizes that this model, once operational, would entail a demanding decision-making process. This underscores the necessity of entrusting executive powers to a dedicated authority that can make decisions based on a set of clear principles. Such a multilateral system must be capable of ensuring the inclusive, equitable, sustainable and rational sharing of the benefits of space resources while facilitating the actual use of those resources and integrating the practical contingencies of resource management and exploitation, notably on site.
- 12. On that basis, Belgium has identified the elements featured in the annex to the present document as potential building blocks for a general approach to a United Nations framework for the exploration, use and exploitation of natural resources of celestial bodies.
- 13. Belgium would like to submit the present document, in particular its annex, for consideration and possible discussion under the item of the Legal Subcommittee's agenda dedicated to the topic of space resources and within the Subcommittee's Working Group on Legal Aspects of Space Resources. We would welcome any comments and suggestions in order to improve this initial proposal.

#### Annex

#### Building block 1: Compliance with applicable international law

- Strong reaffirmation of the principles of the Outer Space Treaty and of the political and legal necessity of giving them effective meaning with respect to space resource activities, notably with regard to:
- The equal freedom of all States to explore and use celestial bodies and to access any part thereof
- The non-appropriation of outer space, in whole or in part, by claim of sovereignty
- The exploration, use and exploitation of natural resources of celestial bodies for exclusively peaceful purposes and the prohibition of military activities or activities carried out for military purposes on celestial bodies
- The international responsibility of States for activities in the exploration, use and exploitation of outer space by their national governmental and non-governmental entities
- Mutual consultations in the event of potential or actual harmful interference between activities relating to the exploration, use or exploitation of natural space resources from celestial bodies

#### **Building block 2: Special status for some activities**

• Special status for activities in the exploration, use and exploitation of natural resources from celestial bodies for scientific research purposes, to the extent that such activities comply with the principles of the Outer Space Treaty

The exploration, use and/or exploitation of natural resources from celestial bodies for the purposes of enabling both sustainable scientific research and a long-term presence on celestial bodies should be accorded a specific status, to the extent that such activities are demonstrated to benefit all humankind.

 Recognition of the role of countries engaging in space resource activities through the establishment of a technical advisory committee composed of national operators

Such recognition would reflect the mechanisms adopted as part of the Antarctic Treaty System, namely the status of "consultative party" and the institution of an intergovernmental cooperation body comprising national operators (the Council of Managers of National Antarctic Programmes). However, the existing legal basis (the United Nations space treaties) does not offer sufficient scope for such a forum as the Antarctic Treaty Consultative Meeting; it would be possible to grant decision-making power only to the consultative parties.

#### Building block 3: Notification, impact assessment and consultation mechanism

- Submission of notifications by States to the Office for Outer Space Affairs of applications by national entities for the authorization of activities relating to the exploration, use and/or exploitation of natural resources of celestial bodies
- Performance of an environmental and resource impact assessment and publication of the results of such assessment through the Office for Outer Space Affairs

Such an impact assessment should be provided together with the notification of the application, or within a certain period of time. The assessment should include:

• A detailed description of the envisaged activity

- Facts and forecasts regarding the use and possible exhaustion of resources, taking into account the accessibility and availability of those resources
- Information on the impact of extraction or transformation activities on the environment, including on other deposits and on the use of the same area for different purposes

Any State would be able to respond to the proposed activity on the basis of the impact assessment and request prior consultation within the Committee on the Peaceful Uses of Outer Space once advice had been obtained from the technical advisory committee.

#### **Building block 4: Registration of infrastructure**

• A special registration system for governmental and non-governmental stations and infrastructure that are dedicated fully or partly to activities relating to the exploration, use and exploitation of natural resources of celestial bodies

Considering that stations or infrastructure assembled on celestial bodies may not constitute objects launched into outer space and therefore would not have to be registered in accordance with the Convention on Registration of Objects Launched into Outer Space (Registration Convention), an ad hoc registration system should be set up in order to allow the identification of such stations or infrastructure, in particular if they are owned and operated by non-governmental entities. Any activity carried out onboard such stations or infrastructure should be deemed to be carried out under the jurisdiction and control of the State of registry.

#### Building block 5: Periodic review mechanism

• A mechanism for periodic review by a dedicated subordinate body of the Committee on the Peaceful Uses of Outer Space or under an appropriate agenda item

#### Such reviews could cover:

- National activity reports
- Statistics on activities, compiled by the Office for Outer Space Affairs
- Status of natural resources
- ° Trends/technological advancements
- Economic survey on the distribution of benefits
- Technical advice provided by observers