JUSTICE FOR THE NEW FRONTIER: WHY THE UNITED NATIONS SHOULD CREATE A SPACE COURT THROUGH A CONVENTION PROCESS

BEN CASEY*

Abstract

Recent achievements by private space companies have widened access to outer space beyond government actors. Such innovation complicates the existing legal framework for outer space, which was heavily influenced by Cold War government policies. It also raises questions about the framework's continued applicability to contemporary private sector space exploration. As a result of the framework's potential destabilization by the private space sector, calls for changes to the traditionally state-exclusive domain are being made with increasing frequency.

This Article argues how and why the United Nations should, through its convention process, modify space law to incorporate private actors. Space law is currently fragmented amongst treaties, multilateral agreements, and national legislation, leaving private actors unprotected. An emerging trend of filling gaps in space law with national legislation is worrisome because it encourages post-Cold War geopolitical tensions, in direct opposition to foundational space treaty principles.

Bringing private actors into the legal framework for outer space must be a priority. This article advocates for the United Nations to call a convention to comprehensively modify the outer space legal regime, to create a space court similar to the Tribunal of the Law of the Sea (ITLOS), and to include non-governmental interests through the granting of permanent observer status. Using the International Tribunal for the Law of the Sea (ITLOS) as a guide, this Article argues that an equivalent tribunal for outer space is the best chance for addressing future space disputes and for granting legal protections to private entities operating in space. It further argues that a space court expands the rule of law into outer space, furthers the mandate of the United Nations and existing space treaties, and is adaptable to a rapidly evolving area of law.

^{*} Ben Casey, Articles Editor, Texas Tech Law Review; J.D. Candidate, Texas Tech University School of Law; B.A., 2011, Texas Tech University. The author wishes to thank Dean Jack Wade Nowlin, Associate Dean Jamie Baker, Professor Michael S. Dodge, Professor Jorge A. Ramírez, Professor Vickie Sutton, and Lawson Hamilton for their editorial contributions and feedback through the writing process of this Article. Further, the author wishes to thank his wife, Sabra, for her continuous love and support. © 2023, Ben Casey.

I.	Inti	RODUCTION	116
II.	CONSTANTLY EXPANDING: SPACE LAW MEETS THE PRIVATE		
	Sector		118
	А.	Origins of International Law: Custom and Treaty	119
	B.	Geopolitical Analogies Lead to Space Treaties	122
	С.	We Have Liftoff: The Booming Private Space Industry	125
III.	UN-CONVENTIONAL METHODS: INTERNATIONAL LAW GETS ITS SEA		
	LEGS		129
	А.	Path from Draft Resolution to Adopted Convention	129
	В.	Waving Hello to the Law of the Sea	130
IV.	ALIGNING THE STARS FOR A SPACE LAW UPDATE		134
	А.	Treating Space as the Unique Domain That We Know It to	
		Be	135
	В.	Current Space Law Is Not Equipped to Handle Private	
		Actors	140
	С.	The UN Plays a Vital Role in Addressing Private Parties	145
V.	A PROPOSAL FOR AN UNITED NATIONS CONVENTION ON THE LAW		
	OF OUTER SPACE		151
	А.	From Ocean Floors to Night Skies: Law of the Sea as a Model	
		for a Space Convention	151
	В.	A Seat at the Table: Granting UN Observer Status to the	
		Private Sector	157
	С.	The Political Feasibility of a Space Convention	158
VI.	Cor	NCLUSION	163

I. INTRODUCTION

Picture this: two tourists, floating in the vacuum of space, enjoying a beautiful view of Earth. The first tourist snaps picture after picture, blinding the second tourist with their camera's flash. Angry and incensed after several minutes of this, the second tourist yanks the camera out of the first tourist's hands and pushes the tourist in the chest of their space suit. The placement of the shove damages the oxygen delivery mechanism of the first tourist's space suit, and the loss of oxygen causes the tourist to panic and suffer a heart attack. Since the assault did not occur on a spacecraft, could the first tourist sue the second? If so, in what court? Hypothetical situations like these are no longer farfetched and must be addressed quickly.

Advancements in the capability for private spaceflight raises many questions— unfathomable during the space race of the 1960s—about

the use and exploration of outer space by private entities.¹ The law must change to account for emerging technologies and their attendant issues.² Current legal protections for private entities in outer space are inadequate, as are many of the proposed solutions to this problem.³

Inevitably, disputes will arise from private action in outer space. This underscores the urgent need for a "space court."⁴ Existing space law is based on international treaties that confer legal protections to nations alone.⁵ However, the United Nations (UN), with its foundational purpose of global peace and security, can play a vital role in harmonizing space law for private and governmental parties alike.⁶ To this end, there are two major actions the UN should take: first, call a convention to regulate and write rules for all areas and uses of outer space, and second, grant non-governmental organizations observer status in the convention and in the General Assembly.

This Article discusses the practicality of these two major actions. The scope of this Article is not focused on the particulars of such a court (i.e., the court's physical location, how to calculate damages, etc.), but instead is focused on its achievable formation and the potential resulting benefits. Part II provides a primer on international law, how the five primary space treaties were influenced by geopolitics, and how recent capabilities in the private space industry destabilize the status quo. Part III discusses the function and authority of the UN General Assembly and reviews the Convention of the Law of the Sea as an example of the convention process. Part IV argues that to account for private actors in

^{1.} *See* G.A. Res. 2222 (XXI), annex, Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, including the Moon and Other Celestial Bodies (Dec. 19, 1966) [hereinafter Outer Space Treaty] (relating the purpose and aims of the treaty to nations and countries).

^{2.} E.g., Julia Griffith, A Losing Game: The Law is Struggling to Keep Up with Technology, J. HIGH TECH. L. (Apr. 12, 2019), https://sites.suffolk.edu/jhtl/2019/04/12/a-losing-game-the-law-is-struggling-to-keep-up-with-technology/ ("It has been estimated that the law is at least five years behind developing a technology.").

^{3.} See Kennedy Williams, Note, Space Crime Continuum: Discussing Implications of the First Crime in Space, 39 B.U. INT'L L.J. 79 (2021); Matthew B. Hershkowitz, Deep Space (Treaty) Exploration: Reviving Today's Obsolete Space Treaties, 28 MICH. ST. INT'L L. REV. 1 (2019); Nina Tannenwald, Law Versus Power on the High Frontier: The Case for A Rule-Based Regime for Outer Space, 29 YALE J. INT'L L. 363 (2004); Ty S. Twibell, Note, Space Law: Legal Restraints on Commercialization and Development of Outer Space, 65 UMKC L. REV. 589 (1997).

^{4.} See Chris Impey, Is Conflict in Space Inevitable?, THE HILL (Oct. 8, 2021, 11:30 AM), https://thehill.com/opinion/international/575903-is-conflict-in-space-inevitable.

^{5.} See infra Parts II.C (describing recent trends in the private space industry) and IV.B (limitations of UN space treaties).

^{6.} See U.N. Charter ch. I (establishing the purposes and principles of the Charter).

outer space, the current legal scheme needs to address issues of standing to bring suit, redressability of harm, and jurisdictional limitations. Finally, Part V argues for the UN to facilitate the creation of a space court by calling a convention and granting permanent observer status to non-governmental organizations, and for the private sector to participate in the formation discussions of such a court.

II. CONSTANTLY EXPANDING: SPACE LAW MEETS THE PRIVATE SECTOR

International law stems from the repeated actions of nations, agreements formed between nations, and through the adoption of legal practices by civilized societies. This historical state-centric model has prevailed but faces problems brought by technological changes, which outpace the development and implementation of a legal structure capable of addressing attendant issues.

Nations were, until recently, the only actors in outer space.⁷ However, changing priorities of government administrations have opened the door for private development of space technology through public-private partnerships.⁸ This has led to rapid innovation in the private sector, resulting in non-governmental entities developing the ability and technological expertise to launch themselves into space.⁹ What was once theoretical science fiction is now reality.¹⁰ A market for space tourism already exists, and soon the average citizen will be able to use space commercially for travel or leisure.¹¹ However, geopolitical tensions for outer space have resulted in a treaty-based legal regime—derived from faulty analogies—focusing solely on the actions of nation states, rather than responding to this new reality.¹²

^{7.} Tim Sharp, *SpaceShipOne: The First Private Spacecraft*, SPACE.COM (Mar. 5, 2019), https://www. space.com/16769-spaceshipone-first-private-spacecraft.html. In 2021, SpaceX's Inspiration4 mission became the first private spaceflight with an all-civilian crew. Nadia Drake, *SpaceX Takes 4 Passengers to Orbit—A Glimpse at Private Spaceflight's Future*, NAT'L GEOGRAPHIC (Sept. 15, 2021), https://www. nationalgeographic.com/science/article/spacex-takes-4-passengers-to-orbit-a-glimpse-at-privatespaceflights-future.

^{8.} See, e.g., Karen L. Jones, Public-Private Partnerships: Stimulating Innovation in the Space Sector, AEROSPACE (Apr. 18, 2018), https://aerospace.org/sites/default/files/2018-06/Partnerships_ Rev_5-4-18.pdf.

^{9.} See Matt Weinzierl & Mehak Sarang, *The Commercial Space Age is Here*, HARV. BUS. REV. (Feb. 12, 2021), https://hbr.org/2021/02/the-commercial-space-age-is-here.

^{10.} *See, e.g.*, Ian Cullen, *Space Tourism: From a Science Fiction Staple to Reality?*, SCIFI PULSE (Mar. 20, 2019), https://www.scifipulse.net/space-tourism-from-a-science-fiction-staple-to-reality/.

^{11.} See discussion infra Part II.C (examining the reality of space tourism).

^{12.} See discussion infra Part II.B (discussing analogies for outer space and the five UN space treaties).

A. Origins of International Law: Custom and Treaty

In the aftermath of two World Wars, the failure of the League of Nations was evident.¹³ This failure sparked a resolve to learn from the past's errors and create a new global organization more suited to uphold world peace in the future.¹⁴ There was no mention of international law in the original draft of the UN Charter, but the drafters pointedly incorporated it in the final draft in 1945.¹⁵ The UN is built upon four "pillars:" peace and security, human rights, the rule of law, and development.¹⁶ Regarding the rule of law and its development, the UN recognizes five primary sources of international law: treaties, international customary law evidenced by state practices, general principles of law "recognized by civilized nations," judicial decisions, and writings of the "most highly qualified publicists."¹⁷ The primary focus for the UN, as it relates to outer space, has been on custom and treaties, and the latter provides the best path towards the creation of a space court because treaties promote continuous cooperation on a global scale.

Sovereignty is a fundamental principle of international law, which developed out of national activities.¹⁸ Repeated interactions between sovereigns, representing and respecting their sphere of authority, develops a mutual custom for how future interactions are expected to

^{13.} See Joseph C. Sweeney, *The United Nations: Reflections on Fifty Years, 1945-1995*, 18 FORDHAM INT'L L.J. 1, 3 (1994) (arguing that the legalistic structure of the League of Nations made the drafters of the UN Charter hesitant to include international law in the Charter).

^{14.} Comparison With the League of Nations, NATIONS ENCYCLOPEDIA, https://www.nations encyclopedia.com/United-Nations/Comparison-with-the-League-of-Nations.html (last visited Dec. 3, 2022).

^{15.} *Id.* The inclusion of international law in the Charter likely served as a counterbalance to the changing politics among superpowers. *See id.* ("The habit of law and the force of public opinion were the controls [smaller nations] sought over the superpowers.").

^{16.} U.N. Charter pmbl.

^{17.} Statute of the International Court of Justice, art. 38, https://www.icj-cij.org/en/statute [hereinafter ICJ Statute]. "Source" in this context refers to a formal source, "the processes through which international law rules become legally relevant." Alain Pellet, *Article 38, in* THE STATUTE OF THE INTERNATIONAL COURT OF JUSTICE: A COMMENTARY 731, 774 (Andreas Zimmermann et al. eds., Oxford Univ. Press 2d ed. 2012). "The codification of this aspect of international law has been successfully accomplished by the definition of the sources of international law as given in Article 38 of the Statute of the International Court of Justice. That definition has been repeatedly treated as authoritative by international arbitral tribunals." *Id.* at 813–32; Hersch Lauterpacht, *Survey of International Law in Relation to the Work of Codification of the International Law Commission*, Memorandum submitted by the Secretary-General, U.N. Doc. A/CN.4/1Rev.1, U.N. Sales No. 1948.V.1(1) (1949).

^{18.} Jeffrey A. Rockwell, Why Custom in International Law is so Important, 34 JAG REP. 18, 22 (2007).

be handled.¹⁹ Customary international law (CIL) is therefore understood to be evidenced by a "general practice" (an objective element) which is "accepted as law or followed from a sense of legal obligation" (a subjective element).²⁰ Regarding the subjective element, CIL is especially applicable where internationally-agreed standards are established (e.g. anti-slavery laws, piracy laws).²¹ International law principles often originate in customary law, before being formally ratified in treaties.²² Two examples are the Statute of the International Court of Justice and the Vienna Convention on the Law of Treaties; the former codified the sources of international law, and the latter codified the customary law relating to treaties that had developed over centuries.²³ CIL has applied to the development of outer space law as well, and could set the stage for future development such as the creation of a unified space court.²⁴

Customs and practices have likewise played a vital role in the development of international business.²⁵ The International Chamber of Commerce (Chamber) is one notable example of a global business organization, which acts as an institutional representative for companies worldwide and plays a vital role in formulating voluntary rules for conducting business.²⁶ The Chamber also developed the Uniform Customs

21. Jurisprudence: Sources of Law – Customs, TOPPR, https://www.toppr.com/guides/legal-aptitude/jurisprudence/sources-of-law-customs/ (last visited Oct. 6, 2022).

22. Rockwell, supra note 18, at 21.

^{19.} J.H. Barker, *Space Orientation Course: Lesson 1, Intro/Space Policy/Organizations*, US ARMY COMMAND AND GEN. STAFF COLL., https://ocw.mit.edu/courses/aeronautics-and-astronautics/16-891j-space-policy-seminar-spring-2003/lecture-notes/notes1b.pdf (last visited Oct. 6, 2022).

^{20.} Andrew T. Guzman, *Saving Customary International Law*, 27 MICH. J. INT'L L. 115, 123 (2007); ICJ Statute, *supra* note 17, art. 38 (defining international custom as a "general practice accepted as law"); RESTATEMENT (THIRD) OF THE FOREIGN RELATIONS LAW OF THE UNITED STATES § 102(2) cmt. c (AM. L. INST. 1987) (defining CIL as "result[ing] from a general and consistent practice of States followed by them from a sense of legal obligation").

^{23.} *Id.*; ICJ Statute, *supra* note 17, art. 38; Vienna Convention on the Law of Treaties, May 23, 1969, 1155 U.N.T.S. 331.

^{24.} See G.A. Res. 18/1963 (XVIII), Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space (Dec. 13, 1963) (listing nine principles for outer space activities); Comm. on the Peaceful Uses of Outer Space, Rep. on the Work of Its Fifty-Sixth Session, U.N. Doc. A/AC.105/C.2/L.299 (2017) (hypothesizing that non-binding principles, resolutions, and guidelines could foster "a uniform practice which may evolve to become customary international law.").

^{25.} See generally Marek Dubovec, ICC's Art of Making UCP vs. International Art of Making International Rules Open-Door vs. Closed-Door Policy, 59 LC VIEWS (Sept. 2006), https://lcviews.com/index.php?page_id=23.

^{26.} Who We Are, INT'L CHAMBER COM., https://iccwbo.org/about-us/who-we-are/ (last visited Oct. 6, 2022). The strength and legitimacy of the Chamber comes from its members' expertise in international commerce. Business Expertise, INT'L CHAMBER COM., https://iccwbo.org/about-us/

and Practice for Documentary Credits (UCP), which is a "set of clearlydefined rules for governing the issuance and applications of letters of credit (LCs) on an international scale."²⁷ Other organizations, like the International Civil Aviation Organization (ICAO), developed outside of the UN structure yet maintain close ties within it.²⁸

Treaties are a significant source of international law that may be developed in various bodies of the UN or between interested nations, and offer a viable method for establishing a space court.²⁹ Some treaties are self-executing (becoming law upon adoption with no further action needed by the signing parties), while others are non-self-executing (requiring the signing nations to pass domestic laws to incorporate the treaty provisions into their individual legal systems).³⁰ Neither the International Court of Justice (ICJ) nor the UN Charter are self-executing treaties, and decisions by the ICJ are not legally binding on a nation's legal system without incorporation through the legislative process.³¹

Like custom, treaties affect international business practices. For example, the UN Convention on Contracts for the International Sale

27. Jason Gordon, What is the Uniform Customs and Practice for Documentary Credits (UCP)?, BUS. PROFESSOR, https://thebusinessprofessor.com/en_US/122296-law-transactions-amp-risk-management-commercial-law-contract-payments-security-interests-amp-bankruptcy/uniform-customs-and-practice-definition (last updated July 22, 2021).

28. See ICAO and the United Nations, ICAO, https://www.icao.int/about-icao/History/Pages/ icao-and-the-united-nations.aspx (last visited Oct. 6, 2022). The ICAO is a Specialized Agency in the UN, meaning it coordinates its work with the UN through negotiated agreements. See UN Specialized Agencies, U.N. DAG HAMMARSKJOLD LIBR., https://research.un.org/en/docs/unsystem/ sa (last visited Oct. 6, 2022).

29. See Uphold International Law, U.N., https://www.un.org/en/our-work/uphold-internationallaw (last visited Dec. 1, 2021); International Law and Justice, U.N., https://www.un.org/en/globalissues/international-law-and-justice (last visited Oct. 6, 2022).

30. See International Norms and Standards Relating to Disability, U.N., https://www.un.org/esa/socdev/enable/comp101.htm (last visited Oct. 6, 2022).

31. See id.; Medellin v. Texas, 552 U.S. 491 (2008) (concluding that an ICJ judgment is not directly enforceable as domestic law in a state court in the United States); Josh Blackman, UN Charter Article 2(4) and the Supreme Law of the Land, JOSH BLACKMAN (Apr. 11, 2017), https://joshblackman.com/blog/2017/04/11/u-n-charter-article-24-and-the-supreme-law-of-the-land/. But see James W. Pfister, Self-Executing Treaties and Judgments, MONROE NEWS (Nov. 22, 2021), https://www.monroenews.com/story/opinion/columns/2021/11/22/james-pfister-self-executing-treaties-and-judgments/8710321002/ (arguing that ICJ judgments should be binding as self-executing law based on the Supremacy Clause of the United States Constitution).

who-we-are/business-expertise/ (last visited Oct. 6, 2022) ("The know-how and vision of our members ensure the world business organization continually evolves to meet the needs of businesses today[.] In turn, our members and experts count on [the Chamber's] influence to get business views across to governments and intergovernmental organizations, whose decisions affect corporate finances and operations worldwide.").

of Goods (CISG), a widely adopted treaty, "also serves as the source of inspiration for many regional and national laws."³² Trade and investment treaties likewise affect the responsibilities of businesses through provisions that encourage the observation of standards.³³ The annual Organisation for Economic Co-operation and Development (OECD) Investment Treaty Conference, for example, "allows senior investment treaty policy makers and negotiators from around the world to exchange views with leading representatives of business, trade unions, civil society, academia and international [organizations]."³⁴ Still other treaties have affected how businesses self-govern; multinational corporations write corporate codes of conduct and business ethics codes to "guide [their] behavior and compliance with human rights."³⁵

B. Geopolitical Analogies Lead to Space Treaties

Early advancements in the Space Age resulted in a scramble to create rules to address space activity.³⁶ Cold War politics between the United States and the Soviet Union, and fear that immediate action would be necessary to avoid armed conflict, spurred an urgency to act.³⁷ The resulting space regime was founded using analogies influenced by earthbound interests, comparing outer space to the high seas and to Antarctica.³⁸

^{32.} International Sale of Goods (CISG) and Related Transactions, UNCITRAL, https://uncitral.un. org/en/texts/salegoods (last visited Oct. 6, 2022). CISG essentially swaps national contract law with common international contract law. See generally United Nations Convention on Contracts for the International Sale of Goods (Vienna, 1980) (CISG), UNCITRAL, https://uncitral.un.org/en/texts/ salegoods/conventions/sale_of_goods/cisg (last visited Oct. 6, 2022).

^{33.} David Gaukrodger, Business Responsibilities and Investment Treaties, ORGANIZATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT [OECD] 2 (2020), https://www.oecd.org/daf/inv/investment-policy/Consultation-Paper-on-business-responsibilities-and-investment-treaties.pdf. 34. Id.

^{35.} Trudie Longren, *Human Rights in the Global Business Ethics Codes*, AZCENTRAL, https:// yourbusiness.azcentral.com/ethical-moral-values-industrial-organization-29333.html (last visited Oct. 6, 2022); *see*, *e.g.*, G.A. Res. 217 (III) A, Universal Declaration of Human Rights (Dec. 10, 1948); G.A. Res. 58/4, Convention Against Corruption, U.N. Doc. A/58/422 (Oct. 31, 2003); G. A. Res. 55/25, annex I, Convention Against Transnational Organized Crime, U.N. Doc. A/45/49 (Nov. 15, 2000). *But see New Study Confirms: All Social Responsibility Programs NOT Created Equal!*, COAL. OF IMMOKALEE WORKERS (July 21, 2020), https://ciw-online.org/blog/2020/07/msiintegrity-study/ (detailing the Multi-Stakeholder Initiative model's failure to protect human rights).

^{36.} Elizabeth Mendenhall, *Treating Outer Space Like a Place: A Case for Rejecting Other Domain Analogies*, U.R.I. MARINE AFF. 1 (2018), https://digitalcommons.uri.edu/cgi/viewcontent.cgi? article=1011&context=maf_facpubs.

^{37.} Id. at 3.

^{38.} Andrew Brearly, Mining the Moon: Owning the Night Sky?, 4 ASTROPOLITICS 43, 48-49 (2006).

The most enduring to space in legal regime-building has been the high seas, which equates space with the ocean and celestial bodies with the seabed.³⁹ The prevailing idea was to treat outer space as a commons or *res communis*, a non-appropriable, open access area, since space was also fluid, rife with solid materials, and vast.⁴⁰ The high seas analogy "define [d] the political-geographical border between outer space (understood as high seas) and airspace (understood as territorial seas)."⁴¹

Like islands in the ocean, celestial bodies have been described as "islands in space."⁴² Islands were historically subject to appropriation; proponents of the high sea analogy sought to avoid this with celestial bodies.⁴³ Cold War politics led to a non-appropriation principle regarding celestial bodies in an effort to avoid one superpower gaining access to the detriment of others.⁴⁴ This shift away from the concept of *res nullius* was notable during negotiations for the Moon Agreement: "celestial bodies were compared to the non-coastal seabed which had been declared the 'common heritage of mankind' in the late 1960s and early 1970s."⁴⁵ However, during the negotiations of the Outer Space Treaty, celestial bodies were instead likened to Antarctica.⁴⁶

The Antarctic Treaty established Antarctica as a commons, while simultaneously preserving existing territorial claims made by the signatory nations.⁴⁷ The Antarctic Treaty promotes the free and peaceful use of Antarctica for scientific research and prohibits all military activities and nuclear explosions on the continent.⁴⁸ Also, nations retain jurisdiction over their citizens while in Antarctica.⁴⁹ Antarctica and outer space

^{39.} Mendenhall, supra note 36, at 4.

^{40.} *Id*.

^{41.} Id.

^{42.} *Id.*; DANDRIDGE M. COLE & DONALD W. COX, ISLANDS IN SPACE: THE CHALLENGE OF THE PLANETOIDS 7–8 (Chilton Company 1st ed. 1964).

^{43.} COLE & COX, supra note 42.

^{44.} Id.

^{45.} *Id.* The author notes that the Moon Agreement has many principles, norms, and rules that are identical to the International Seabed Authority. *Id.* at 5.

^{46.} Id. at 5.

^{47.} *Id.* (discussing the Antarctic Treaty's replacement of the *res nullius* assumption with a *res communis* principle); Antarctic Treaty art. IV, Dec. 1, 1959, 12 U.S.T. 794, 402 U.N.T.S. 71 (providing that current claims to territorial sovereignty are not disturbed but no new claims may be made).

^{48.} Antarctic Treaty, *supra* note 47, arts. I, II, and V. Specifically, the Treaty applies to "the area south of [sixty degrees] South Latitude." *Id.* art. VI.

^{49.} *Id.* art. VIII. This provision also leaves dispute resolution to nations ("[C] ontracting 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."). *Id.*

have been viewed as "last frontiers" due to their inhospitable environments⁵⁰ and analogizing them allowed the UN to rely on international regulations as a model for the outer space regime to achieve lasting peace among nations.⁵¹ The Antarctic Treaty's success in reserving the continent for peaceful and scientific uses bolstered this position.⁵² It was also successful in temporarily halting rival territorial claims and "demonstrated a path for avoiding militarized superpower conflict in a new planetary domain."⁵³

Five outer space treaties have been adopted by the General Assembly, which form the current space law regime's legal framework.⁵⁴ By far the most influential is the Outer Space Treaty (OST), which establishes the basic principles regarding the exploration and use of space by nations,⁵⁵ namely that outer space activities are to be carried out for the benefit of mankind, that space and celestial bodies are not subjected to national appropriation, and that exploration and use of space is to be only for peaceful purposes.⁵⁶ The OST also outlines that the use and exploration of outer space must be in accordance with international law.⁵⁷ The other space treaties build upon the principles laid out in the OST.⁵⁸

52. Mendenhall, supra note 36, at 5.

56. *Id.* The term "peaceful" has not been clearly defined, nor has the concept of "province of all mankind." Tannenwald, *supra* note 3.

57. Outer Space Treaty, supra note 1, art. I.

58. See Rescue Agreement, supra note 54 (elaborating on Articles V and VIII of the OST); Liability Convention, supra note 54 (elaborating on Article VII of the OST); Registration Convention, supra note 54 (expanding on the desire for identifying space objects described in

^{50.} Mendenhall, supra note 36, at 5.

^{51.} See Julie Easter, Note, Spring Break 2023 - Sea of Tranquility: The Effect of Space Tourism on Outer Space Law and World Policy in the New Millennium, 26 SUFFOLK TRANSNAT'L L. REV. 349, 383 (2002); Twibell, supra note 3 (comparing space to the high seas and Antarctica). See generally Antarctic Treaty, supra note 47 (articulating global policies dealing with treatment of Antarctica). The UN used the Antarctic Treaty to provide the substantive provisions of the Outer Space Treaty. Eric Husby, Sovereignty and Property Rights in Outer Space, 3 D.C.L. J. INT'L L. & PRAC. 359, 362 (1994) (discussing utilization of Antarctic Treaty in drafting UN outer space laws).

^{53.} *See id.* ("Some scholars of outer space argue that the Antarctic Treaty System served as the analogical 'base model' for the outer space regime.") (citing EVERETT C. DOLMAN, ASTROPOLITIK: CLASSICAL GEOPOLITICS IN THE SPACE AGE 123 (Frank Cass ed. 2002)).

^{54.} Joseph A. Bosco, International Law Regarding Outer Space - An Overview, 55 J. AIR L. & COM. 609, 614 (1990); See also Outer Space Treaty, supra note 1; G.A. Res. 2345 (XXII), Rescue Agreement (Dec. 3, 1968); G.A. Res. 2777 (XXIX), Liability Convention (Sept. 1, 1972); G.A. Res. 3235 (XXIX), Registration Convention (Sept. 15, 1976); G.A. Res. 34/68, Moon Agreement (July 11, 1984).

^{55.} Outer Space Treaty, supra note 1.

The other four space treaties are the Rescue Agreement, the Liability Convention, the Registration Convention, and the Moon Agreement. The Rescue Agreement provides that states must take appropriate steps to render aid and help astronauts in distress.⁵⁹ The Liability Convention creates absolute liability to a launching state for damages on Earth's surface or in space, caused by space objects; claims against offending nations must be arbitrated through diplomatic channels.⁶⁰ The purpose of the Registration Convention is to give states a mechanism to help identify space objects via compiled data from the launching states.⁶¹ Lastly, the Moon Agreement prohibits nations from establishing military bases or testing military weapons on the moon and requires the establishment of a process to regulate natural resource exploitation of the moon, *if and when* technological developments make exploitation possible.⁶²

C. We Have Liftoff: The Booming Private Space Industry

How increased private activity will affect outer space is an open question.⁶³ Within the past twenty years, the satellite industry has grown increasingly privatized, accounting for roughly 76% of the entire space economy revenue in 2015 alone.⁶⁴ The U.S. Federal Aviation Administration began licensing and permitting commercial launches in 2004, and as a result, private companies have dominated the space launch services sector ever since.⁶⁵ The largest revenue-generating company in this area, Space Exploration Technologies Corporation (SpaceX),

Article X of the OST); Moon Agreement, *supra* note 54 (applying OST provisions to the Moon and other celestial bodies).

^{59.} Rescue Agreement, supra note 54, art. II; Bosco, supra note 54, at 615–16.

^{60.} See generally Liability Convention, supra note 54.

^{61.} Convention on Registration of Objects Launched into Outer Space, U.N. OFFICE FOR OUTER SPACE AFFAIRS, https://www.unoosa.org/oosa/en/ourwork/spacelaw/treaties/introregistration-convention. html (last visited Oct. 6, 2022); Bosco, *supra* note 54, at 617–18.

^{62.} *See* Moon Agreement, *supra* note 54, art. 2–4, 11. As of January 1, 2021, only eighteen nations have ratified the Moon Agreement. Comm. on the Peaceful Uses of Outer Space, Rep. of the Legal Subcomm. on Its Sixtieth Session, U.N. Doc. A/AC.105/C.2/2021/CRP.10, 10 (2021).

^{63.} E.g., Dimitri Linden, *The Impact of National Space Legislation on Private Space Undertakings: Regulatory Competition vs. Harmonization*, 8 J. SCI. POL'Y & GOVERNANCE 1 (2016) (discussing how the privatization and commercialization of space has led to diverse national space laws that differ in scope and content).

^{64.} Christina Isnardi, Note, Problems with Enforcing International Space Law on Private Actors, 58 COLUM. J. TRANSNAT'L L. 489, 495 (2020) (citing Matthew Weinzierl, Space, the Final Economic Frontier, 32 J. ECON. PERSP. 173, 179 (2018)).

^{65.} Id. at 496.

has more of a global market share of commercial launches than all nations combined. $^{\rm 66}$

Because of increased commercialization of the space industry, the global space market is set for continuing, long-term growth.⁶⁷ Specific industries like space tourism, notably trips beyond Earth's orbit, are quickly becoming a reality.⁶⁸ Private companies are even in partnership to build space stations comparable in size to the International Space Station.⁶⁹ As part of a collaboration with NASA, private companies Nanoracks, Voyager Space, and Lockheed Martin plan to build a space station, called Starlab, for "tourism and other commercial and business activities."⁷⁰ Operation of private space stations could allow companies from all over the world to conduct lucrative research in microgravity (appearing weightless), which is currently limited to the International Space Station.⁷¹ Likewise, huge financial opportunities exist for the space mining industry, where asteroids and celestial bodies contain

^{66.} Id.

^{67.} See, e.g., Tom Roeder, State of Space 2022: Industry Enters 'Era of Access and Opportunity', SPACE REP. ONLINE, https://www.thespacereport.org/uncategorized/state-of-space-2022-industry-entersera-of-access-and-opportunity/ (last visited Oct. 6, 2022) (finding that the \$447 billion space industry is expected to reach unprecedented milestones in 2022); *Creating Space*, MORGAN STANLEY, https:// www.morganstanley.com/Themes/global-space-economy (last visited Oct. 6, 2022) (estimating that the global space industry could exceed \$1 trillion by 2040).

^{68.} See Global Space Tourism Market Report 2022: Expansion of Sector Bodes Well for General Space and Technology Research, GLOBE NEWSWIRE (Aug. 30, 2022, 4:33 AM), https://www.globenewswire. com/en/news-release/2022/08/30/2506432/28124/en/Global-Space-Tourism-Market-Report-2022-Expansion-of-Sector-Bodes-Well-for-General-Space-and-Technology-Research.html; List of Space Tourism (Personal Spaceflight) Companies, RANKER, https://www.ranker.com/list/space-tourism-_personal-spaceflight)-companies/reference/ (last updated Jun. 8, 2017); see also Jackie Wattles, Jeff Bezos' Blue Origin Wants to Build a Tourism Space Station Nearly as Big as the ISS, CNN BUSINESS (Oct. 25, 2021), https://www.cnn.com/2021/10/25/tech/blue-origin-space-station-jeff-bezos-scn/index.html. (describing proposals such as a commercial space station for scientific experiments, space tourism, and possibly in-space manufacturing).

^{69.} Chris Young, *The First-Ever Free-Flying Commercial Space Station' Will Launch in 2027*, INTERESTING ENGINEERING (Oct. 22, 2021), https://interestingengineering.com/the-first-ever-free-flying-commercial-space-station-will-launch-in-2027.

^{70.} *Id.* The private space station allows NASA to have "comparable research capability and volume to the ISS, but at significantly lower construction and operational costs. This enables NASA to invest further in missions to the Moon, Mars, and beyond." *Id.*

^{71.} Wattles, *supra* note 68. The benefits of experimenting in microgravity is that it gives scientists "a better fundamental understanding of how something works." *Id.*; *See also* Christian Davenport, *With a Huge Infusion of Cash, Sierra Space Hopes to Get its Dream Chaser Spaceplane and Space Station Off the Ground*, WASH. POST (Nov. 19, 2021), https://www.washingtonpost.com/technology/2021/11/19/sierra-space-investment-dream-chaser-orbital-reef/.

resources valued in the trillions of dollars.⁷² Companies could mine iron, ore and titanium from the Moon, and it has been estimated that a single asteroid could produce billions of dollars' worth of raw materials.⁷³ Whether motivated by dissatisfaction with NASA's pace of progress,⁷⁴ financial gain, or scientific discovery,⁷⁵ private space actors will push the total global space economy to \$1 trillion in the 2040s.⁷⁶

This growth and expansion of space industries underscores the problem raised by private actors operating in outer space: how will the law apply to them, if at all? The situation is easier if the parties are from the same country.⁷⁷ For example, in 2019, National Aeronautics and Space Administration (NASA) astronaut Anne McClain was accused of accessing the bank account of her partner while aboard the International Space Station (ISS).⁷⁸ Article 22 of the 1994 Intergovernmental

75. See generally Dylan Love, The Next Frontier: Space Miners Are the Universe's Future Tycoons, NBC NEWS, https://www.nbcnews.com/mach/space/next-frontier-space-miners-are-universe-s-future-tycoons-n698711 (last updated Dec. 26, 2016) ("[asteroids] are commonly home to water ice – or hydrogen and oxygen, the building blocks of rocket fuel."); see also Mike Wall, Water Ice Common on Asteroids, Discovery Suggests, SPACE.COM (Oct. 8, 2010), https://www.space.com/9292-water-ice-common-asteroids-discovery-suggests.html. Private companies understand the lucrative potential of the space market. Nanoracks "has sought to own and operate a private space station to fully unlock market demand." Young, *supra* note 69. The company has also developed technology for space farm outposts which could be used here on Earth to address the rising need for solutions to combat the effects of climate change on crops. Id.

76. Isnardi, *supra* note 64, at 498–99; Jeff Foust, *A Trillion-Dollar Space Industry Will Require New Markets*, SPACE NEWS (July 5, 2018), https://spacenews.com/a-trillion-dollar-space-industry-will-require-new-markets/ [https://perma.cc/96ZN-3948].

77. Treaties or agreements tend to provide a scope of jurisdictional authority; for example, Article VI of the Outer Space Treaty makes states responsible for "national activities" and non-governmental bodies. Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, Including the Moon and Other Celestial Bodies art. VI, Oct. 10, 1967, 19 U.S.T. 7570, 672 U.N.T.S. 119. Therefore, nations retain authority to resolve disputes as part of these "national activities."

78. Chelsea Gohd, *Who Investigates a Crime in Space*?, SPACE.COM (Aug. 29, 2019), https://www.space.com/who-investigates-space-crime.html.

^{72.} Isnardi, *supra* note 64, at 497–98; Matthew Davis, *Will Asteroid Mining Be an Outer-Space Gold Rush*?, BIG THINK (Sept. 28, 2018), https://bigthink.com/technology-innovation/economic-impact-of-asteroid-mining?rebelltitem=1#rebelltitem1 [https://perma.cc/NUQ9-ZRJC].

^{73.} *See, e.g.*, ASTERANK, http://www.asterank.com/ (last visited Oct. 6, 2022) (estimating profits of over 600,000 asteroids based on various categories).

^{74.} E.g., Jemayel Khawaja, *Moonshot 3.0—Inside ConsenSys Space and TruSat*, CONSENSYS (Nov. 4, 2019), https://consensys.net/blog/news/moonshot-3-0-inside-consensys-space-and-trusat/ (detailing the goal of a "bottom-up, global collective action to carry out ambitious space missions").

Agreement on Space Station Cooperation treaty (IGA) specifies that each nation may "exercise criminal jurisdiction over personnel in or on any flight element who are their respective nationals."⁷⁹ So, although the alleged crime occurred in space, both McClain and her partner being U.S. citizens meant the issue was governed by American law and did not implicate the IGA.⁸⁰

More difficult is determining, with any reasonable certainty, how a space dispute might be resolved between private multinationals. If such a dispute occurred on a vessel launched from Earth, the law of the launching nation would apply.⁸¹ If it occurred on the ISS, the laws of the nation's pod where the dispute occurred would apply.⁸² Yet the law gives little guidance where such neat-cut situations do not apply. Suppose two tourists are floating in space and one assaults the other; they are outside of a space object launched from Earth and are not inside the ISS. In this hypothetical, the possibility of legal recourse seems slim.⁸³

^{79.} Agreement Among the Government of Canada, Governments of Member States of the European Space Agency, the Government of Japan, the Government of the Russian Federation, and the Government of the United States of America Concerning Cooperation on the Civil International Space Station art. 22, Jan. 29, 1998, 1998 U.S.T. 303, T.I.A.S. No. 12927 [hereinafter IGA].

^{80.} Gohd, supra note 78; see generally IGA, supra note 79.

^{81.} See Liability Convention, supra note 54.

^{82.} See IGA, supra note 79.

^{83.} Article VI of the Outer Space Treaty states that activities of "non-governmental entities... shall require authorization and continuing supervision by the appropriate State Party to the Treaty." Outer Space Treaty, supra note 1, art. VI. The Treaty does not define "non-governmental entity" and while it is plausible that the drafters intended for private actors to be covered under this term, it is not explicitly stated. Isnardi, supra note 64, at 511 (citing Frans G. von der Dunk, Back in Business? The Moon Agreement, Private Actors and Possible Commercial Exploitation of the Moon and Its Natural Resources, in INTERNATIONAL AND INTERDISCIPLINARY WORKSHOP ON POLICY AND LAW RELATING TO OUTER SPACE RESOURCES: EXAMPLES OF THE MOON, MARS, AND OTHER CELESTIAL BODIES 244, 254 (2007), https://www.mcgill.ca/iasl/files/iasl/Moon-Proceedings-Part_5_2006. pdf [https://perma.cc/2MGU-2[TG]). The language of Article VI seems to suggest that an aggrieved private party would have to petition their government to submit a claim to the offending party's government on their behalf, an idea bolstered by the language in Article XII of the Liability Convention. See Liability Convention, supra note 54, art. XII (Compensation for liability "shall be determined in accordance with international law and the principles of justice and equity, in order to provide such reparation in respect of the damage as will restore the person, ... to the condition which would have existed if the damage had not occurred."). See also Michael Listner, A New Paradigm for Arbitrating Disputes in Outer Space, SPACE REV. (Jan. 9, 2012), http://www.thespacereview.com/article/2002/1 ("In a diplomatic environment skewed by soft power, the likelihood is slim of resolving a dispute equitably.").

III. UN-CONVENTIONAL METHODS: INTERNATIONAL LAW GETS ITS SEA LEGS

Within the UN, the General Assembly is a forum for multilateral negotiation that plays a major role in setting standards for, and codifying, international law.⁸⁴ The Charter of the UN empowers the General Assembly to initiate studies and make recommendations which promote international cooperation.⁸⁵ Much of this work is performed in subsidiary bodies which present their findings to the General Assembly for consideration and possible adoption.⁸⁶ This process has led to substantial changes to oceanic law, embodying both traditional rules and new legal concepts that addressed emergent concerns, all within one comprehensive instrument.⁸⁷

A. Path from Draft Resolution to Adopted Convention

The General Assembly, the parliamentary body of the UN, meets annually to discuss questions relating to peace and security, initiate studies, and make recommendations for promoting international cooperation, and to consider reports from various UN organs.⁸⁸ The UN Charter empowers the General Assembly to "discuss any questions or any matters within the scope of the present Charter" and "make recommendations to the Members of the United Nations ... on any such questions or matters."⁸⁹ The General Assembly is also authorized to establish subsidiary organs "for the performance of its functions."⁹⁰ Subsidiary organs have been established in a wide range of areas; for example, the International Law Commission (ILC) encourages the progressive development and codification of international law by conducting research and drafting articles, commentaries, principles, guidelines, or conclusions to be considered for ratification in conventions.⁹¹

^{84.} Functions and Powers of the General Assembly, U.N., https://www.un.org/en/ga/about/background.shtml (last visited Oct. 6, 2022).

^{85.} U.N. Charter art. 13.

^{86.} See U.N. Charter art. 15, ¶ 2.

^{87.} *The United Nations Convention on the Law of the Sea*, U.N., https://www.un.org/Depts/los/convention_agreements/convention_overview_convention.htm (last visited Oct. 6, 2022).

^{88.} U.N. Charter art. 20; see generally U.N. Charter ch. IV.

^{89.} U.N. Charter art. 10.

^{90.} U.N. Charter art. 22.

^{91.} See U.N. Charter art. 13, ¶ 1; INT'L L. COMM'N, https://legal.un.org/ilc/ (last visited Oct. 6, 2022); *Methods of Work*, INT'L L. COMM'N, https://legal.un.org/ilc/methods.shtml (last visited Oct. 6, 2022); G.A. Res. 174 (II), Statute of the International Law Commission, art. 20 (1947) (outlining the process for codifying international law).

The path to ratification is a lengthy process, as it would be for an outer space court. The first substantive step, after identifying a problem that needs to be addressed, is for the subsidiary organs to perform work within their own sessions and then submit a report with a draft convention to the General Assembly for consideration in its next session.⁹² The General Assembly next decides which proposals will be included in the session agenda and allocates those issues to one of six Main Committees for consideration.⁹³ Normally, the allocated agenda items includes a "Programme of Work" for each Committee, which provides a timetable for the work to be performed.⁹⁴ Over several sessions, the Committee reviews the subsidiary organ's report, makes proposed changes, adopts various proposals, and finally makes its recommendation to the General Assembly for adoption of the updated draft convention.⁹⁵ Upon receiving the recommendation, the proposed convention may be adopted by the General Assembly by vote or by consensus.⁹⁶ The adopted provision will then enter into force as provided by the convention language, or if none exists, when all parties consent to be bound.97

B. Waving Hello to the Law of the Sea

The first United Nations Conference on the Law of the Sea (UNCLOS I) was borne from an initiative by the ILC to codify laws for both territorial waters and the high seas, in response to growing concerns about the competition over, and depletion of, various ocean resources.⁹⁸ In 1957, the General Assembly adopted a resolution to convene UNCLOS I to "examine the law of the sea, taking account not only of the legal but also of the technical, biological, economic and political aspects of the problem."⁹⁹ UNCLOS I adopted four conventions and several resolutions regarding topics such as the territorial sea, high

^{92.} Subsidiary Organs of the General Assembly, U.N., https://www.un.org/en/ga/about/subsidiary/index.shtml (last visited Oct. 6, 2022).

^{93.} Functions and Powers of the General Assembly, U.N., https://www.un.org/en/ga/about/background.shtml (last visited Oct. 6, 2022).

^{94.} How Decisions are Made at the UN, U.N., https://www.un.org/en/model-united-nations/ how-decisions-are-made-un (last visited Oct. 6, 2022).

^{95.} Functions and Powers of the General Assembly, U.N., https://www.un.org/en/ga/about/background.shtml (last visited Oct. 6, 2022).

^{96.} Id.; U.N. Charter art. 18.

^{97.} Vienna Convention on the Law of Treaties, supra note 23, at art. 24.

^{98.} United Nations Conference on the Law of the Sea, U.N. CODIFICATION DIV. PUBL'N: DIPLOMATIC CONFS., https://legal.un.org/diplomaticconferences/1958_los/ (last visited Feb. 15, 2023).

^{99.} G.A. Res. 1105 (XI), ¶ 4 (Feb. 21, 1957).

seas, continental shelf, settlement of disputes, humane killing of marine life, conservation efforts, pollution, and nuclear testing on the high seas.¹⁰⁰

In 1960, a second United Nations Conference on the Law of the Sea (UNCLOS II) was convened by the General Assembly to consider the topics which had not been agreed upon in UNCLOS I, specifically limits to the territorial sea and rules around fishing enterprises.¹⁰¹ Although two resolutions were adopted by UNCLOS II, substantive decisions on the topics of the Conference were deferred to a later point.¹⁰²

Then, in 1967, a global diplomatic undertaking was ignited by an impassioned call for "an effective international regime" as the "only alternative by which [humanity] can hope to avoid the escalating tension that w[ould] be inevitable if the present situation [wa]s allowed to continue."¹⁰³ One month later, the General Assembly established the Committee to Study the Peaceful Uses of the Sea-Bed and the Ocean Floor beyond the Limits of National Jurisdiction.¹⁰⁴ Subsequently, the Committee was instructed to prepare for a third Conference on the Law of the Sea (UNCLOS III).¹⁰⁵ The mandate of UNCLOS III was to adopt a convention "dealing with *all* matters relating to the law of the sea," and to this end, specialized agencies, intergovernmental organizations, and interested non-governmental organizations were invited to send observers to the Conference.¹⁰⁶

One hundred sixty states participated in the Conference's eleven sessions, held between 1973 and 1982.¹⁰⁷ The Conference adopted the

^{100.} United Nations Conference on the Law of the Sea, supra note 98.

^{101.} Second United Nations Conference on the Law of the Sea, U.N. CODIFICATION DIV. PUBL'N: DIPLOMATIC CONFS., https://legal.un.org/diplomaticconferences/1960_los/ (last visited Feb. 15, 2023).

^{102.} Id.

^{103.} Maltese Ambassador to the U.N., Remarks to Member States during the Twenty-Second Session of the G.A. (Nov. 1, 1967), https://www.un.org/Depts/los/convention_agreements/ texts/pardo_ga1967.pdf. The "present situation" referred to the struggle between superpower nations that was extending to the oceans, the increasing contamination from pollution, competing legal theories and their effects on the maintenance of a stable order, and the vast resources that lay beneath the seabed. *Id.*

^{104.} Third United Nations Conference on the Law of the Sea, U.N. CODIFICATION DIV. PUBL'N: DIPLOMATIC CONFS., https://legal.un.org/diplomaticconferences/1973_los/ (last visited Feb. 16, 2023).

^{105.} Id.

^{106.} G.A. Res. 3067 (XXVIII), ¶ 3 (Nov. 16, 1973); G.A. Res. 3029 (XXVII), ¶¶ 8–9 (Dec. 18, 1972).

^{107.} Third United Nations Conference on the Law of the Sea, supra note 104.

resulting 320 articles and nine annexes comprising the United Nations Convention on the Law of the Sea on December 10, 1982, and the Convention entered into force on November 16, 1994.¹⁰⁸ Described as "an unprecedented attempt by the international community to regulate all aspects of the resources of the sea and uses of the ocean, and thus bring a stable order to mankind's very source of life," the Convention has been embraced by the international community and has led nations to adopt practices consistent with the Convention.¹⁰⁹ Key provisions of the Convention include limits on territorial sea boundaries, development of the concept of "transit passage," creation of the exclusive economic zone (EEZ), control of continental shelf resources, prospective deep seabed mining administered by the International Seabed Authority (ISA), and the creation of the International Tribunal for the Law of the Sea (ITLOS).¹¹⁰

The preamble to the Convention enumerates its goals and is reflective of the purposes of the UN. For example, achievement of these goals contributes to "a just and equitable international economic order which takes into account the interests and needs of mankind as a whole."¹¹¹ Specifically, the preamble states the belief that

[C]odification and progressive development of the law of the sea achieved in this Convention will contribute to the strengthening of peace, security, cooperation and friendly relations among all nations in conformity with the principles of justice and equal rights and will promote the economic and social advancement of all peoples of the world, in accordance with the Purposes and Principles of the United Nations as set forth in the Charter.¹¹²

The drafters of the Convention were driven by an awareness of the closely interrelated problems of ocean space which "need[ed] to be considered as a whole" and which required a "new and generally acceptable Convention on the law of the sea."¹¹³

^{108.} Id.

^{109.} The United Nations Convention on the Law of the Sea (A Historical Perspective), U.N. OCEANS & L. OF THE SEA, https://www.un.org/depts/los/convention_agreements/convention_historical_perspective.htm (last visited Oct. 6, 2022).

^{110.} *Id*.

^{111.} U. N. Convention on the Law of the Sea pmbl., Dec. 10, 1982, 1833 U.N.T.S. 397 [hereinafter UNCLOS].

^{112.} Id.

^{113.} Id.

A major achievement of the Convention was the establishment of ITLOS, an independent international court with ties to the UN.¹¹⁴ ITLOS has jurisdiction to resolve "all disputes and all applications submitted to it in accordance with th[e] Convention [on the Law of the Sea] and all matters specifically provided for in any other agreement which confers jurisdiction on the Tribunal."115 This includes contentious jurisdiction regarding the interpretation or application of the UNCLOS,¹¹⁶ as well as advisory opinions.¹¹⁷ It is unique as an international tribunal, in that it allows non-State Parties to have access as parties to a dispute or by requesting advisory opinions.¹¹⁸ For instance, there is language in Part XI of the Convention that allows private businesses or individuals to file claims with the Seabed Disputes Chamber in relation to operations "in the Area."¹¹⁹ Non-State Parties may also file claims before the Tribunal if they are made in accordance with another agreement that grants the tribunal jurisdiction and is accepted by all parties in that case.¹²⁰

Additionally, ITLOS maintains a close relationship with the UN.¹²¹ The two entities have agreed, for example, to recognize each other's

118. *Id.* annex VI art. 20 (Access to the Tribunal); *Id.* art. 291 ¶ 2 ("The dispute settlement procedures specified in this Part shall be open to entities other than States Parties only as specifically provided for in this Convention."). These other entities include "international organizations and natural or legal persons" in cases brought to the Seabed Disputes Chamber. *A Guide to Proceedings Before the International Tribunal for the Law of the Sea*, ITLOS (2016), https://www.itlos.org/fileadmin/itlos/documents/guide/1605-22024_Itlos_Guide_En.pdf (opening the Tribunal to non-State entities for cases regarding exploration and exploitation); UNCLOS, *supra* note 111, art. 159, 191 (advisory opinions under the Convention); Rules of the International Tribunal of the Law of the Sea [ITLOS] (Oct. 28, 1997) (outlining the Tribunal's authority to give advisory opinions).

119. UNCLOS, *supra* note 111, art. 187 \P (c) ("The Seabed Disputes Chamber shall have jurisdiction . . . in disputes . . . between parties to a contract, being . . . natural or juridical persons referred to in article 153, paragraph 2(b)"). Natural or juridical persons are those "which possess the nationality of States Parties or are effectively controlled by them or their nationals, when sponsored by such States." *Id.* art. 153 \P 2(b).

120. UNCLOS, *supra* note 111, annex VI, art. 20 ¶ 2; *see also International Agreements Conferring Jurisdiction on the Tribunal*, ITLOS, https://www.itlos.org/en/main/jurisdiction/international-agreements-conferring-jurisdiction-on-the-tribunal/ (last visited Dec. 13, 2022) (listing international agreements with provisions pertaining to the ITLOS' jurisdiction).

121. See Relationship with the United Nations, ITLOS, https://www.itlos.org/en/main/the-tribunal/relationship-with-the-united-nations/ (last visited Feb. 16, 2023); U.N. Secretary-General, Agreement on Cooperation and Relationship Between the United Nations and the International

^{114.} The United Nations Convention on the Law of the Sea (A Historical Perspective), supra note 109.

^{115.} UNCLOS, supra note 111.

^{116.} Id.

^{117.} Id. art. 191.

sphere of authority,¹²² to cooperate and coordinate with each other's activities,¹²³ and attend each other's meetings.¹²⁴ The UN General Assembly granted ITLOS observer status,¹²⁵ which enables it to "participate in the meetings and the work of the General Assembly when matters of relevance to the Tribunal are being considered."¹²⁶

Through this partnership with the UN, the Convention has given the international community tools to address future challenges regarding the law of the sea. This includes helping developing nations benefit from the rights established by the Convention, providing guidance to signatory nations in harmonizing national legislation with the Convention, and monitoring and reporting on implementation of the Convention.¹²⁷ Replicating a similar partnership relating to outer space would be useful for the same reasons; the success and longevity of the Convention, and its relationship with the UN, evinces a path forward for the law of outer space, which is necessary given that space access is now available to non-State actors.

IV. ALIGNING THE STARS FOR A SPACE LAW UPDATE

Technological advances have widened the accessibility of outer space.¹²⁸ New business opportunities spur innovation to compete for market share of the commercial space industry.¹²⁹ Uncertainty in the law presents potential risks for individuals and companies, who may be hesitant to participate without adequate legal protection.¹³⁰ In addressing this uncertainty, new scientific understandings of the nature of outer space should replace the Cold War era's politically-motivated analogical framework.¹³¹ A court or tribunal would provide an incentive for non-governmental parties to continue the peaceful use and exploration

128. See discussion supra Part II.C (discussing private commercial space activities).

Tribunal for the Law of the Sea, U.N. Doc. A/52/968 (June 10, 1998) [hereinafter UN-ITLOS Agreement] (establishing a mechanism for cooperation).

^{122.} UN-ITLOS Agreement, supra note 121, art. 1.

^{123.} Id. art. 2.

^{124.} Id. art. 3.

^{125.} G.A. Res. 51/204 (Feb. 28, 1997).

^{126.} Relationship with the United Nations, supra note 121; G.A. Res. 51/204, supra note 125.

^{127.} The United Nations Convention on the Law of the Sea (A Historical Perspective), supra note 109.

^{129.} See Francesca Street, Inside the Space Hotel Scheduled to Open in 2025, CNN (May 2, 2022), https://www.cnn.com/travel/article/voyager-station-space-hotel-scn/index.html.

^{130.} See, e.g., Miriam Kramer, Wrestling with the Risks of Private Missions to Space, AXIOS (Sept. 14, 2021), https://www.axios.com/private-spaceflight-inspiration4-risk-b3dce62c-0180-415e-bfec-d2a0548825bc.html ("[S] paceflight is still an incredibly risky endeavor and it will likely remain that way for the foreseeable future.").

^{131.} See discussion infra Part IV.A (listing the problems with outer space analogies).

of space by ensuring that parties have recourse for resolving disputes and discouraging cavalier behaviors.¹³² The UN should actively participate in the establishment of a space court using established UN procedures since it is focused on fostering peaceful relations between nations and has the flexibility to incorporate ongoing and changing understandings of the nature of outer space into a legal structure; doing so would provide legitimacy to any created court.¹³³

A. Treating Space as the Unique Domain That We Know It to Be

An accurate scientific image of the material features of space should be adopted in place of outmoded analogical frameworks. Analogies mischaracterize the space environment, which in turn mischaracterizes the interests of space actors. This results in international laws that "inadequately serve the individual space user and larger space community."¹³⁴ It has been said that the "material features of space, interacting with technologies of access, shape the practices, interests, and problems that motivate the formation and operation of the outer space regime."¹³⁵ Unfortunately, this regime has not kept pace with our modern understanding of space.

Historically, diplomats negotiating the OST analogized space as a domain of activity to fit the national narrative.¹³⁶ Effective analogies represent space's actual domain, and different analogies vary in their degree of "fit" with the material realities of outer space.¹³⁷ Unfortunately, none of the analogies reflect the true nature of space; outer space does not have the same physical characteristics of the high seas, or airspace, or even Antarctica.¹³⁸ Each of these realms are limited by the material reality of Earth. As our understanding of space improves, the use of analogies must be reevaluated or replaced in favor of a regime that incorporates the actual material features of outer space.¹³⁹

^{132.} Brian Abrams, First Contact: Establishing Jurisdiction over Activities in Outer Space, 42 GA. J. INT'L & COMP. L. 797, 823–24 (2014).

^{133.} See discussion infra Part V (arguing for the UN to help create the space court).

^{134.} See Sven Grahn, Why We Had Better Drop Analogies When Discussing the Role of Humans in Space, in HUMANS IN OUTER SPACE – INTERDISCIPLINARY ODYSSEYS (Luca Codignola et al., eds. 2009) ("Humans always try to use analogies when new technologies appear.").

^{135.} Id. at 2.

^{136.} Mendenhall, *supra* note 36, at 1 ("At the opening of negotiations over the Outer Space Treaty (OST), 'most governments had little conception of space or space activity...").

^{137.} Id. at 2.

^{138.} Id.

^{139.} Id. at 13.

For centuries, the "freedom-of-the-seas" doctrine declared that international waters did not belong to anyone.¹⁴⁰ Today, states retain jurisdiction over the persons and things aboard vessels sailing in international waters that bear their flag.¹⁴¹ The law of the sea was the model for the public-private relationship governing space.¹⁴² Therefore, a foundational and still appropriate— principle of space law is that outer space is not subject to national appropriation but should remain free for nations to explore and use.¹⁴³ For instance, Article I of the Outer Space Treaty states that space is the "province of all mankind," which distinguishes it as an extra-jurisdictional territory.¹⁴⁴

Comparing outer space with airspace has been abandoned since the 1960s.¹⁴⁵ Material differences between the physical characteristics of outer space and the Earth's atmosphere made any division of outer space into segmented sovereign territories a conceptual nightmare; the orbital space environment is constantly shifting so it would be impossible for a nation to track their space territory.¹⁴⁶

Floating cities existing in international waters or in non-territorial airspace may also be considered a province of all mankind needing a legal structure like the proposed space court.¹⁴⁷ For example, China created three artificial islands and claimed sovereignty over the entire South China Sea, an area with territory claimed by several other nations including Brunei, Indonesia, Malaysia, the Philippines, Taiwan, and Vietnam.¹⁴⁸ Under the UNCLOS agreement, national sovereignty disputes are submitted to a conciliation commission, but the parties are

148. See Territorial Disputes in the South China Sea, CTR. FOR PREVENTATIVE ACTION: GLOB. CONFLICT TRACKER, https://www.cfr.org/global-conflict-tracker/conflict/territorial-disputes-south-china-sea (last updated May 4, 2022).

^{140.} Oceans and the Law of the Sea, U.N., https://www.un.org/en/global-issues/oceans-and-the-law-of-the-sea (last visited Oct. 6, 2022).

^{141.} See generally Sergio Marchisio, National Jurisdiction for Regulating Space Activities of Governmental and Non-Governmental Entities, U.N. OFF. FOR OUTER SPACE AFF. 2 (Nov. 16–19, 2010), https://www.unoosa.org/pdf/pres/2010/SLW2010/02-02.pdf.

^{142.} Mendenhall, supra note 36, at 13.

^{143.} Twibell, supra note 3, at 594.

^{144.} Marchisio, supra note 141, at 2.

^{145.} Mendenhall, supra note 36, at 4.

^{146.} Id.

^{147.} In recent years, the concept of floating cities has been reevaluated as a possible solution to problems related to climate change, overcrowded cities, and natural disasters. *See, e.g., Floating Cities: Your Guide to the Future of Urban Construction*, BIGRENTZ (June 26, 2019), https://www.bigrentz.com/blog/floating-cities. Floating cities in the air may not be technologically feasible now, but similar legal issues would presumably arise whether a city is floating on water or in the air. The fictional Star Wars "Cloud City" provides a conceptual idea for a floating sky city. *See* THE EMPIRE STRIKES BACK (Twentieth Century-Fox Film Corporation 1980).

not bound by the commission's decision or finding.¹⁴⁹ This is precisely what China is currently doing in the South China Sea.¹⁵⁰ Despite the commission ruling against it, China continues to pressure neighboring countries "to give away their rights to the oil, gas and fish" in the South China Sea.¹⁵¹ Although China has not complied with the UNCLOS decision, it has curbed its behavior.¹⁵² Having the commission in place and it's authority recognized by UN Members has arguably restricted an otherwise unchecked appropriation of territory.

Many of the principles underlying the 1957 Antarctic Treaty mirror the Outer Space Treaty and yet do not encompass future space needs.¹⁵³ Both agree that their respective domains be used for peaceful purposes only.¹⁵⁴ The Antarctic Treaty provided a foundation for many of the "Space Treaty's important substantive provisions" while meeting the goal of avoiding a national rivalry in space.¹⁵⁵ Governments analogized space to Antarctica to "garner public support for ... strategic national initiatives and ... American Cold War internationalism."¹⁵⁶ Use of the analogy waned because "too many interests [were] committed to a more robust program and too many people [were] attached to the romantic idea of the space frontier."¹⁵⁷ In other words, when the analogy had served its purpose, it was discarded.¹⁵⁸

While approaching the domain of space using analogies helped to develop early agreements, these analogies are proving inadequate for substantive problem-solving as access evolves. There are fundamental

151. Hayton, supra note 150.

153. See infra Part IV.B (current space law does not contemplate private actors).

155. Twibell, supra note 3, at 595.

^{149.} See The United Nations Convention on the Law of the Sea (A Historical Perspective), supra note 109.

^{150.} See Bill Hayton, Two Years On, South China Sea Ruling Remains a Battleground for the Rules-Based Order, CHATHAM HOUSE (July 11, 2018), https://www.chathamhouse.org/2018/07/twoyears-south-china-sea-ruling-remains-battleground-rules-based-order (detailing China's claims and dismissal of the UNCLOS rulings invalidating those claims). For an example of a successful settlement reached through conciliation commission, see Dia Tamada, *The Timor Sea Conciliation: The Unique Mechanism of Dispute Settlement*, 31 EUR. J. INT'L L. 321 (2020).

^{152.} Jill Goldenziel, *Here's Why China is Afraid of an Obscure International Court*, FORBES (July 19, 2021, 12:18 PM), https://www.forbes.com/sites/jillgoldenziel/2021/07/19/heres-why-china-is-afraid-of-an-obscure-international-court/?sh=4bb38e683d8c (noting that after the decision was released, China has "consistently allowed Filipino fishermen to access" the claimed waters).

^{154.} See Antarctic Treaty, supra note 47, art. 1; Outer Space Treaty, supra note 1, art. IV \P 2.

^{156.} James Spiller, Scientific Exploration in Antarctica as an Analogy for American Spaceflight, 12 ASTROPOLITICS 180, 182 (2014).

^{157.} Id. at 190.

^{158.} Mendenhall, supra note 36, at 6.

differences between outer space and air, water, and Antarctica.¹⁵⁹ Despite being unlike any other place, analogizing outer space to other areas has persisted because of its apparent similarities with features of our own world.¹⁶⁰ Which analogy is used depends on the purpose it can serve the espousing party.¹⁶¹ Consequently, analogies are unlikely to solve substantive problems involving outer space since they bring with them ideas designed for very different settings and omit crucial aspects of the space environment.¹⁶² We see the result of using inaccurate analogies in the current space regime: the creation of international laws and treaties that "inadequately serve the individual space user and the larger space community."¹⁶³

The better approach moving forward is one proposed by Dr. Elizabeth Mendenhall, which "emphasizes the special role of scientific knowledge in producing a useable and useful 'locational classification."¹⁶⁴ Dr. Mendenhall convincingly argues that because outer space establishes limitations on what humans can do, how they can do it, and the repercussions, a scientific image of outer space—which is continually updated in an effort to depict the objective material reality accurately—is more helpful for collective governance.¹⁶⁵ In other words, the practices, interests, and issues that drive the creation and administration of the outer space regime are necessarily shaped by the physical characteristics of space as they interact with access technologies.¹⁶⁶

Six major features of outer space are overlooked or distorted by the use of analogies: distribution of access to technology, existential impacts (i.e., risks to humans traveling in the outer space environment, such as cosmic radiation and high-speed space debris), infinite frontier, lack of ecology, lack of fluidity, and nature of movement.¹⁶⁷ Unlike geopolitically-influenced analogies, these features "affect the motivations for and requirements of space access ... [and determine] what kinds of threats exist (who they threaten and how)."¹⁶⁸ These features should be

159. Id.
160. Id.
161. Id.
162. Id. at 11.
163. Id. at 3.
164. Id. at 2.
165. Id.
166. Id.
167. Id. at 7.
168. Id. at 13.

the basis of space law, otherwise private actors are "likely to cause new conflict in outer space governance."¹⁶⁹

Access to specialized technology affects the number and type of actors that can access space, which in turn affects the politics of the space regime. Most of the international community can promote technology transfer and profit redistribution as a minority of affluent space actors set precedent and mainstream behaviors.¹⁷⁰ This is being realized through the adoption of the 2030 Agenda for Sustainable Development, of which utilizing "space-based technologies play an ever-increasing role."¹⁷¹

The environment of outer space presents empirical risks to humans, including unfiltered radiation and collisions with comets, asteroids, or cosmic debris.¹⁷² The lack of "ecological sources of renewal and stabilization" in space means there are no finite resources, which in turn affects the goal-espoused in existing space treaties-of sustainable space access and use.¹⁷³ Likewise, space lacks flows of liquids or gases that shape the ecosystem like we have on Earth.¹⁷⁴ These conditions present a context for future treaty negotiations to reconsider the "commons" approach to space, given that space resources are speculative and difficult to access.¹⁷⁵ Movement in space is done at high speeds and space objects interact in passing due to difficulties of syncing their velocities; this makes space-based operations unlike Earth-based operations because of the impossibility to claim or partition an object in a physical, static, and permanent manner.¹⁷⁶ Also, space presents an infinite frontier that is ever-expanding-any policy created from a view of space as the "final frontier" is hampered by the truly staggering distance between objects and the lack of technology necessary to reach them within a human life span.¹⁷⁷ Analogies have already been implemented into the existing space law regime, but consideration of outer space as a place, specifically its material features, should influence

^{169.} *Id.* For example, a lack of regulations regarding private space activity could be interpreted as allowing all private space actions, including mining operations or housing nuclear arsenals.

^{170.} Id. at 9.

^{171.} Simonetta Di Pippo, *Space Technology and the Implementation of the 2030 Agenda*, U.N. CHRONICLE, https://www.un.org/en/chronicle/article/space-technology-and-implementation-2030-agenda (last visited Dec. 16, 2022).

^{172.} Mendenhall, supra note 36, at 10.

^{173.} Id. at 8.

^{174.} Id.

^{175.} Id.

^{176.} Id. at 9; Howard Kleinberg, On War in Space, 5 ASTROPOLITICS 1, 1-27 (2007).

^{177.} Mendenhall, supra note 36, at 10.

needed regime development to achieve collective goals of the space community. 178

Powerful nations are already positioning themselves as the new caretakers of space law, addressing legal gaps left by the space treaties through domestic action. For example, the United States recently changed its space policy to "encourage international support for the public and private recovery and use of resources in outer space, consistent with applicable law."¹⁷⁹ A space regime driven by national legislation is not beneficial for the global community. Such legislation is selfserving and is at odds with the foundational space treaties. Under that approach, nations would avoid responsibility for dealing with a hypothetical private militaristic moon base. An international space court, however, would be compatible with OST principles because its overall goal is to protect the interests of all actors in outer space by providing a forum for dispute resolution.

B. Current Space Law Is Not Equipped to Handle Private Actors

Why has the burgeoning private space industry not yet resulted in substantive changes to space law? The lack of any adjudicative system with clear jurisdiction over private activities imperils private space actors.¹⁸⁰ Imagine a private party is robbed while vacationing on the moon or gets injured by space debris while floating outside of their space hotel window. Do they have standing to bring a lawsuit? If so, what would be the proper venue? Would a private space company's employee be able to file a Workers Compensation claim if they were injured in a mining accident? Would that company, operating in outer

^{178.} Id. at 15.

^{179.} Exec. Order No. 13,914, 85 Fed. Reg. 20,381 (Apr. 6, 2020) ("Outer space is a legally and physically unique domain of human activity, and the United States does not view it as a global commons.").

^{180.} There seems to be no clear answer to the question of whether Article II (the nonappropriation principle) and Article VI (national activities subject to authorization and supervision) of the OST apply to private individuals. *Compare* Frans G. von der Dunk, *The Origins of Authorisation: Article VI of the Outer Space Treaty and International Space Law, in* 6 STUDIES IN SPACE LAW 3, 6–10 (Frans G. von der Dunk ed., 2011) (detailing the various interpretations of "national activities" in Article VI), *with* Stephen Gorove, *Interpreting Article II of the Outer Space Treaty,* 37 FORDHAM L. REV. 349 (1969), https://ir.lawnet.fordham.edu/flr/vol37/iss3/2 (arguing that Article II of the OST does not prohibit individual appropriation or acquisition of space), *and* International Institute of Space Law [IISL], *Further Statement by the Board of Directors on Claims to Lunar Property Rights,* INT'L INST. SPACE L. (March 22, 2009), https://iislweb.space/wp-content/ uploads/2020/01/Statement-BoD.pdf ("Since there is no territorial jurisdiction in outer space or on celestial bodies, there can be no private ownership of parts thereof, as this would presuppose the existence of a territorial sovereign competent to confer such titles of ownership.").

space, be subject government agency regulations, such as the Occupational Safety and Health Administration (OSHA)? Would a party be subject to a breach of contract claim for not delivering supplies to an outpost within the stipulated timeframe? Do parties owe each other specific duties of loyalty or care in space? And what law would govern criminal matters that occurred in space? Would intentionality make a difference in choice of law or selecting a venue? If a civil or criminal matter, originating in space, was brought to trial, what entity would have jurisdiction over the claim? Where would the court sit? How would juries be selected, if at all? Situations and questions like these are no longer farfetched because of the newfound access to space for private actors.

Immediate global action is needed to address this new reality and the problems that come with it. Private companies have developed space-flight capabilities and the existing market for space tourism, space mining, and satellite services will continue to grow.¹⁸¹ This advancement not only brings new opportunities commercially but will also likely attract criminal enterprise.¹⁸² History is replete with examples of opportunistic bad actors who prey on the weak or defenseless,¹⁸³ and it is naïve to assume this will not also occur in space. This reality makes it more baffling that no mechanism for resolving private space disputes exists.

Of the five space treaties, only the Liability Convention has a built-in alternative dispute resolution (ADR) mechanism for resolving disputes where diplomacy has failed.¹⁸⁴ However, this method has never been

^{181.} See, e.g., Arnie Weissmann, Exploration Tourism, TRAVEL WKLY. (Aug. 16, 2021), https:// www.travelweekly.com/Travel-News/Travel-Agent-Issues/Exploration-tourism#; Sissi Cao, Jeff Bezos Escalates Fight With NASA, Blue Origin Loses Top Moon Lander Engineer to SpaceX, OBSERVER (Aug. 17, 2021, 12:27 PM), https://observer.com/2021/08/blue-origin-spacex-fight-nasa-moonlander-contract-lawsuit/.

^{182.} See Gregory D. Miller, Space Pirates, Geosynchronous Guerrillas, and Nonterrestrial Terrorists: Nonstate Threats in Space, 33 AIR & SPACE POWER J. 33, 42 (2019). See generally Christopher J. Newman, Exploring the Problems of Criminal Justice in Space, ROOM (2016), https://room.eu.com/article/exploring-the-problems-of-criminal-justice-in-space (last visited Feb. 18, 2023).

^{183.} See, e.g., The Journal of Christopher Columbus (Sunday, Oct. 14, 1492), 1 AM. YAWP READER 1, 13 (2020), http://www.americanyawp.com/reader/wp-content/uploads/The-American-Yawp-Reader-Vol-1-Fall-2020.pdf ("These people are very simple . . . [and could be] kept as captives . . .; for with fifty men they can all be subjugated and made to do what is required of them"); see also John Putnam, Gold Rush Lawlessness, MY GOLD RUSH TALES (Aug. 16, 2011), http://mygoldrushtales.com/gold-rush-lawlessness/ (discussing how criminals and professional gamblers came to California to prey on honest gold miners).

^{184.} Liability Convention, supra note 54; Listner, supra note 83.

used, so it is unclear how effective it would be.¹⁸⁵ Also, this method only applies to governmental actors, and even if a beneficial result is achieved, decisions are binding only if the parties consent—otherwise, they serve as a recommendation.¹⁸⁶

Some international agreements include provisions that make decisions binding on its members.¹⁸⁷ For example, Article 296 of UNCLOS states that, "[a]ny decision rendered by a court or tribunal having jurisdiction under this section shall be final and shall be complied with by all the parties to the dispute."¹⁸⁸ This means that any judgment is as enforceable as a court decision in a Member's domestic court.¹⁸⁹ Other enforcement mechanisms simply encourage alternative dispute resolution (ADR) methods. In 2011, the Permanent Court of Arbitration (PCA) published the Optional Rules for Arbitration of Disputes Relating to Outer Space Activities (the Rules) to promote ADR methods that can be applied for use in an ever-changing space community.¹⁹⁰ These rules were based off well-established procedural rules common to international arbitration.¹⁹¹ To date, these Rules have not been widely accepted in the space industry, but likely will as more complex space disputes arise.¹⁹²

The Committee on the Peaceful Uses of Outer Space (COPUOS) is an example of an enforcement mechanism that relies on cooperation through diplomacy.¹⁹³ It tries to increase participation in the space treaties by Member States and encourages those members to adopt

188. UNCLOS, supra note 111, art. 296.

^{185.} Listner, supra note 83.

^{186.} Id.; Liability Convention, supra note 54, art. XIX.

^{187.} Steven Groves, Accession to UN Convention on the Law of the Sea Would Expose the U.S. to Baseless Climate Change Lawsuits, HERITAGE FOUND (Mar. 12, 2012), https://www.heritage.org/global-politics/report/accession-un-convention-the-law-the-sea-would-expose-the-us-baseless-climate; UNCLOS, *supra* note 111, annex VI, art. 33 (noting that decisions of the Tribunal are final and binding on the parties with respect to a particular dispute).

^{189.} *Id.*; UNCLOS, *supra* note 111, annex VI, art. 39 ("The decisions of the [Seabed Disputes] Chamber shall be enforceable in the territories of the States Parties in the same manner as judgments or orders of the highest court of the State Party in whose territory the enforcement is sought.").

^{190.} Listner, *supra* note 83 ("The PCA offers a forum for the resolution of disputes involving various combinations of states, state entities, intergovernmental organizations, and private parties.").

^{191.} See Charles B. Rosenberg & Vivasvat Dadwal, *The 10 Year Anniversary of the PCA Outer Space Rules: A Failed Mission or the Next Generation?*, KLUWER ARB. BLOG (Feb. 16, 2021), http://arbitrationblog.kluwerarbitration.com/2021/02/16/the-10-year-anniversary-of-the-pca-outer-space-rules-a-failed-mission-or-the-next-generation/.

^{192.} See id.

^{193.} Isnardi, supra note 64, at 516-17.

national laws to codify the agreements.¹⁹⁴ Using diplomacy to further enforcement is limited by procedural rules that make introducing resolutions difficult; such resolutions also require a unanimous vote to pass.¹⁹⁵ Diplomacy may be disrupted due to political motivations and nations may vote against a rival's proposal for no apparent reason at all.¹⁹⁶ Even when a resolution is adopted, it us up to the Member States to have it codified through national legislation, which rivals may refuse to do.¹⁹⁷ The efficacy of diplomacy alone is therefore significantly limited in its ability to bring about real changes for space disputes of the future.¹⁹⁸

Outside of the UN, non-governmental entities like the International Chamber of Commerce provide services for domestic and international dispute resolution that are available to anyone, "from individuals and private sector enterprises to states and state entities."¹⁹⁹ The International Centre for Settlement of Investment Disputes (ICSID) provides dispute resolution of international investment issues through arbitration and conciliation.²⁰⁰ However, the inherent problem with regard to private space disputes is twofold. First, there would be an

198. Id. International Relations (IR) perspectives, which shape how we see the world in a broader context, may help explain these motivations. See HENRY R. NAU, PERSPECTIVES ON INTERNATIONAL RELATIONS: POWER, INSTITUTIONS, AND IDEAS 5 (4th ed. 2015). The realist perspective focuses on variables like power and competing national interests. Robert L. Pfaltzgraff, Jr., International Relations Theory and Spacepower, in TOWARD A THEORY OF SPACEPOWER: SELECTED ESSAYS 40, 46 (Charles D. Lutes ed. 2011). Competing national interests exist "in a world of anarchy, with states comprising an international system that requires them to rely extensively on their own means of survival or to join alliances or coalitions with others sharing their interests." Id. The liberal perspective advocates for increased cooperation to discourage the use of force and promote world peace. Id. at 10 (defining the liberal perspective as one that "emphasizes repetitive relationships and negotiations, establishing patterns or institutions for resolving international conflicts"). Finally, the identity perspective sees ideas as being more important than either power or institutions when shaping international outcomes. Id. at 12 (defining the identity perspective as one that "emphasizes the causal importance of the ideas and identities of actors, which motivate their use of power and negotiations.").

199. Dispute Resolution Services, INT'L CHAMBER COM., https://iccwbo.org/dispute-resolutionservices/ (last visited Oct. 6, 2022). The ICC created its own International Court of Arbitration to "exercise judicial supervision of arbitration proceedings" but is a court in name only; it does not issue formal judgements. *ICC International Court of Arbitration*, INT'L CHAMBER COM., https:// iccwbo.org/dispute-resolution-services/icc-international-court-arbitration/ (last visited Oct. 6, 2022) ("Our purpose is to ensure proper application of the ICC Rules, as well as assist parties and arbitrators in overcoming procedural obstacles.").

200. About ICSID, ICSID, https://icsid.worldbank.org/About/ICSID (last visited Oct. 6, 2022).

^{194.} Id. at 517.

^{195.} Id.

^{196.} Id.

^{197.} Id.

inherent power imbalance between a private entity and a state entity; smaller private entities, such as individuals, have fewer resources than a government to pursue their claims effectively. Second, smaller entities do not have comparable authority to states and cannot rely on privileges such as sovereign immunity. This is a problem that could be addressed in a treaty.

As access to space widens, filling the gaps left by nation-focused treaties will become more important.²⁰¹ A good faith treaty regulating private space action could be enough for near-Earth activity, but this is not the best long-term solution because it keeps nations in control and those nations' interests may conflict with those they are regulating. The collective security system of the UN Charter needs reform because it is too outdated to effectively deal with potential threats from non-state entities.²⁰² Unlike the traditional nation-against-nation military threats that influenced the UN's creation, modern threats are guerilla-like; as with cyberspace, attacks seemingly come from all directions.²⁰³ Such threats include extreme zealots amassing arsenals of weapons and committing acts of genocide, terror groups targeting peaceful and populous gatherings to inflict maximum carnage in protestation of their views, or tyrannical governments that starve their own citizens and maintain order through fear, intimidation, and force.²⁰⁴ A space court with jurisdiction to pursue responsible non-state actors for crimes in space serves as an integral piece of the cooperative security solution within the scope of the larger global community.²⁰⁵

Existing space law primarily focuses on interactions between governmental actors or their agents.²⁰⁶ Although the five space treaties have some jurisdictional reach for conflict resolution, as currently structured they are non-specific and therefore unhelpful to private disputes.²⁰⁷

^{201.} Private actors are playing a bigger role in international conflicts, with non-national combatants able to get military weapons and not following Geneva Conventions. *See Practical Guide to Humanitarian Law*, MEDECINS SANS FRONTIERES, https://guide-humanitarian-law.org/ content/article/3/non-state-armed-groups/ (last visited Oct. 6, 2022).

^{202.} Thomas M. Franck, *Collective Security and UN Reform: Between the Necessary and the Possible*, CHI. J. INT'L L. 597, 600 (2006).

^{203.} See Miller, supra note 182, at 36.

^{204.} Franck, supra note 202, at 600-01.

^{205.} See Miller, supra note 182, at 46 (addressing the need for collaboration between states and the international community to deal with nonstate threats to space).

^{206.} See generally Outer Space Treaty, supra note 1; Rescue Agreement, supra note 54; Liability Convention, supra note 54; Registration Convention, supra note 54; Moon Agreement, supra note 54.

^{207.} Notably, the Liability Convention provides a framework for States to submit claims for compensation through diplomatic channels. *See* Liability Convention, *supra* note 54.

The reality is that without reform, private parties cannot counter or address threats in outer space and this is intolerable. Scholars use many hypotheticals to show existing problems within the current space scheme and offer proposed solutions.²⁰⁸ However, it is not enough for nations to avoid legal gaps between their own jurisdiction and those created by international law.²⁰⁹ Nor is it any longer reasonable to keep the current space jurisdictional scheme that reserves space access to nations only.²¹⁰ The international community cannot place reliance on a superpower to use its position to support an operational regime because doing so naively ignores or minimizes the inherent conflicting national interests at play.²¹¹ Simply put, now that private parties can access space, the nation-based treaty structure of space law is no longer a sufficient vehicle to achieve the goals of peaceful use and exploration of space.²¹²

C. The UN Plays a Vital Role in Addressing Private Parties

Private space actors are without a voice, but the UN can provide one. The main purposes of the UN are keeping the peace throughout the world, developing and maintaining friendly relations among nations, and being a "[center] for harmonizing the actions of nations to achieve these goals."²¹³ Since its founding, the United Nations has held the requisite authority to establish a space court.²¹⁴ In 1945, Article 7 of the UN Charter established the International Court of Justice (ICJ) to be its principle judicial organ.²¹⁵ At that time, outer space activities by

215. Id.

^{208.} See generally, e.g., Stephen Gorove, Criminal Jurisdiction in Outer Space, 6 INT'L L., 313 (1972), https://scholar.smu.edu/til/vol6/iss2/7 (proposing the need for further clarification of outer space rules); Michael J. Listner & Joshua T. Smith, A Litigator's Guide to the Galaxy: A Look at the Pragmatic Questions for Adjudicating Future Outer Space Disputes, 23 VAND. J. ENT. & TECH. L. 53 (2020) (arguing that the U.S. federal court system is capable of addressing private space disputes); Susan J. Trepczynski, New Space Activities Expose a Potential Regulatory Vacuum, 43 REPORTER 12, 12, 20 (2016) (advocating more domestic legislation to address the regulation of private space activities); Matthew JP Horton, Consolidating Space: A Proposal to Establish a Central Forum for the Settlement of Space-Related Disputes, 22 VAND. J. ENT. & TECH. L. 627 (2020).

^{209.} Marchisio, supra note 141, at 7.

^{210.} Horton, supra note 208, at 661.

^{211.} See, e.g., Tannenwald, supra note 3.

^{212.} Ram S. Jakhu & Yaw Otu M. Nyampong, *International Regulation of Emerging Modes of Space Transportation, in* SPACE SAFETY REGULATIONS AND STANDARDS 215, 223 (Joseph N. Pelton & Ram S. Jakhu eds., 2010).

^{213.} Id.

^{214.} U.N. Charter art. 7 ("Such subsidiary organs as may be found necessary may be established in accordance with the present Charter.").

private parties were not contemplated—the space race would not begin for another ten years.²¹⁶ The ICJ's limited jurisdiction over legal disputes, which is limited to those between nations,²¹⁷ makes the ICJ insufficient in the context of outer space. When everyday individuals or businesses are operating in space, the existing rule of law, though vitally important, cannot adequately protect them.²¹⁸ However, the authority conferred upon the UN in 1945 included the tools needed to address this gap.²¹⁹

How is the rule of law important for private actors? According to the United Nations system, the rule of law is "a principle of governance in which all persons, institutions and entities, public and private, including the State itself, are accountable to laws that are publicly promulgated, equally enforced and independently adjudicated, and which are consistent with international human rights norms and standards."220 This is important because it provides for fairness and opportunity of redress of grievances to private actors. Also, the rule of law is a foundational principle to achieving international peace and the protection of people's fundamental rights and freedoms.²²¹ It adheres to universal ideas such as equality before the law, fairness in the law's application, legal certainty, and legal transparency.²²² These principles are consistent with those guiding space exploration and use, as substantiated in the 1963 Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space.²²³ There, the General Assembly declared that among other principles, the activities of states using and exploring 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."224

224. See id.

^{216.} *Space Race Timeline*, ROYAL MUSEUMS GREENWICH, https://www.rmg.co.uk/stories/topics/space-race-timeline (last visited Oct. 6, 2022).

^{217.} ICJ Statute, supra note 17, art. 35.

^{218.} See discussion supra Part IV.B (describing the space law regime as nation-centric).

^{219.} U.N. Charter arts. 108, 109 (detailing the procedure for Charter amendments).

^{220.} What is the Rule of Law, U.N. & RULE L., https://www.un.org/ruleoflaw/what-is-the-rule-of-law/ (last visited Oct. 6, 2022).

^{221.} Id.

^{222.} Id.

^{223.} See G.A. Res. 1962 (XVIII), Declaration of Legal Principles Governing the Activities of States in the Exploration and Use of Outer Space (Dec. 13, 1963).

A centralized international regulatory and adjudicative authority is needed to regulate the private space industry.²²⁵ The Moon Agreement seems to advocate for such an organization²²⁶ and there have already been calls for the UN to establish a World Space Organization (WSO) or some other form of global space governance based on uniform practices.²²⁷ Customs and standards, on which a unified space authority would be built, are reflected in the rule of law and in the five existing space treaties.²²⁸ Not only is a space court a natural extension of the rule of law into outer space, it is an extension of, and compatible with, the UN Charter's mandate.²²⁹ Further, a space court's case law would follow customary and common law principles.²³⁰ Customary law, a formal source of international law, requires use by a nation and the belief of legal obligation.²³¹ International law embraces the concept of custom as necessary to fostering progress for humanity.²³² As a space court develops a body of jurisprudence, custom will remain a unifying force²³³ despite its detractors.²³⁴

228. See supra Part II.B (discussing the underlying principles of the Outer Space Treaty).

229. Nobody wishes for a repeat of the history that led to the UN's creation; following two world wars, a lasting peace between nations was desired. See U.N. Charter pmbl. ("We the peoples of the United Nations [are] determined to save succeeding generations from the scourge of war, which twice in our lifetime has brought untold sorrow to mankind...."). The League of Nations had failed to prevent the Second World War and the UN was established to take its place. *Predecessor: The League of Nations*, U.N., https://www.un.org/en/about-us/history-of-the-un/ predecessor (last visited Oct. 6, 2022); Olivia B. Waxman, 5 Things to Know About the League of Nations, TIME (Jan. 25, 2019, 9:40 AM), https://time.com/5507628/league-of-nations-history-legacy/.

230. See Matthew C. Porterfield, An International Common Law of Investor Rights?, 27 U. PA. J. INT'L ECON. L. 79, 79 (2014); Connie de la Vega, The Right to Equal Education: Merely a Guiding Principle or Customary International Legal Right?, 11 HARV. BLACKLETTER L. J. 37, 38 (1994) ("Customary international law essentially is international common law.").

231. Brian Wessel, The Rule of Law in Outer Space: The Effects of Treaties and Nonbinding Agreements on International Space Law, 35 HASTINGS INT'L & COMP. L. REV. 289, 298 (2012).

232. Rockwell, *supra* note 18, at 23.

233. *See id.* ("The law evolves best when it derives from the interaction of individuals or entities in their respective communities at the lowest levels....").

234. The efficacy of CIL is criticized on several grounds. For example, the widening international community through more nations being created may hinder the "general practice" element of CIL. H.W.A. THIRLWAY, INTERNATIONAL CUSTOMARY LAW AND CODIFICATION: AN

^{225.} See Isnardi, supra note 64, at 523–24; Edwin W. Paxson, III, Note, Sharing the Benefits of Outer Space Exploration: Space Law and Economic Development, 14 MICH. J. INT'L L. 487, 513–16 (1993); Jakhu & Nyampong, supra note 212, at 224.

^{226.} *See supra* text accompanying note 61 (discussing the requirement to establish a regulatory process).

^{227.} Eng Teong See, *Commercialization of Space Activities - The Laws and Implications*, 82 J. AIR L. & COM. 145, 166 n.114 (2017); Isnardi, *supra* note 64, at 524 n.198.

Development of common international space law operates much like the development of customs and practices in international businesses.²³⁵ The UCP, for instance, standardizes international business practices to address conflicting national regulations.²³⁶ The ICAO, as a Specialized Agency of the UN, works closely with several UN and international organizations to benefit its members.²³⁷ The UN has the authority to bring non-governmental entities into the UN structure by granting observer status or by establishing Specialized Agencies.²³⁸ There is no explicit provision of the UN Charter that speaks to observer status, but the process to grant this status is described in a 2008 legal opinion which cites a 1994 General Assembly decision.²³⁹ Specialized Agencies are "international organizations working with the [UN], in accordance with relationship agreements between each organization and the [UN]"²⁴⁰ This authority, if granted to private space entities, would be beneficial to the private space industry because it would include private entities in a rapidly-changing area and give them an opportunity to voice their interests in any deliberations establishing a space court.²⁴¹

The established UN framework and the success of the space treaties would provide legitimacy to a newly established convention and subsequent space court.²⁴² For UN Members, there exists a consensus of the

235. See generally Swaine, supra note 234, at 569 nn.26–28 (discussing common international business customs).

236. Gordon, supra note 27.

237. See ICAO, supra note 28 (discussing the ICAO-UN relationship).

238. How Do Organizations and Non-member States Get Observer Status in the General Assembly?, U.N. DAG HAMMARSKJOLD LIBR., https://ask.un.org/faq/14519 (last visited Oct. 6, 2022); UN Specialized Agencies, U.N. DAG HAMMARSKJOLD LIBR., https://research.un.org/en/docs/unsystem/sa (last visited Oct. 6, 2022).

239. How Do Organizations and Non-member States Get Observer Status in the General Assembly?, supra note 238; 2008 U.N. Jurid. Y.B., U.N. Doc. ST/LEG/SER.C/46; G.A. Dec. 49/426, U.N. Doc. A/ DEC/49/426, at 341 (Dec. 19, 1994). "Permanent Observers may participate in the sessions and workings of the General Assembly..." *Id.*

240. UN Specialized Agencies, supra note 28; U.N. Charter art. 58 (coordinating policies and activities of Specialized Agencies).

241. This occurred during the formation of the ITLOS. *See* G.A. Res. 51/204, *supra* note 125; *see also* UN-ITLOS Agreement, *supra* note 121.

242. The United Nations at 74: Legitimacy in Question?, LEGITIMACY GLOB. GOVERNANCE, https:// www.statsvet.su.se/leggov/blog/the-united-nations-at-74-legitimacy-in-question-1.459911 (last updated Oct. 24, 2019) ("Elite approval of this major global governance institution is reasonably

EXAMINATION OF THE CONTINUING ROLE OF CUSTOM IN THE PRESENT PERIOD OF CODIFICATION OF INTERNATIONAL LAW 31 (1971); see David P. Fidler, *Challenging the Classical Concept of Custom:* Perspectives on the Future of Customary International Law, 39 GERMAN Y.B. INT'L L. 198, 198 (1996); Edward T. Swaine, *Rational Custom*, 52 DUKE L.J. 559, 563 (2002) ("Even custom's most ardent supporters . . . have difficulty explaining how it arises, and . . . why customary practices should be considered binding on states.").

important core values of the law itself which lends credibility to a space court and increases the likelihood that it will endure.²⁴³ The decisionmakers on the international scene are those with vast political, governmental, and economic power, so their view of the UN as legitimate supports the idea that a new space court would benefit from UN support.²⁴⁴ The Outer Space Treaty has been important to developing continued cooperation among nations for the peaceful use of outer space.²⁴⁵ However, space treaties are inefficient in one major respect: they do not bind private parties who operate in outer space.²⁴⁶ Rather than sounding the death knell on any UN involvement, this highlights the merits of linking the UN to private industry, given the success of the international business model.²⁴⁷ For instance, by negotiating broadly embraced technological norms in a variety of areas (customs procedures, intellectual property, telecommunications, aviation, shipping, etc.), the UN has supplied the "soft infrastructure" for the world economy.²⁴⁸ It has also paved the way for investment by encouraging economically-sound, business-friendly policies and legislation.²⁴⁹

Within the established UN framework, only the Committee on the Peaceful Uses of Outer Space (COPUOS) deals with "international cooperation in the peaceful uses of outer space" and monitors developments in exploration and use of space.²⁵⁰ Membership has expanded

firm, but citizen legitimacy beliefs are weaker, although stable over the past decade."); Simonetta Di Pippo, *Space Technology and the Implementation of the 2030 Agenda*, U.N. CHRON., https://www.un. org/en/chronicle/article/space-technology-and-implementation-2030-agenda (last visited Oct. 6, 2022) (noting that "the United Nations has a long legacy of facilitating international cooperation in outer space").

^{243.} *The United Nations at 74: Legitimacy in Question?, supra* note 242 ("If people perceive the UN to be legitimate, then it could help the organization to get resources, to make policies, to gain compliance with its decisions, and to make an impact on global problems.").

^{244.} See id.; Outer Space Treaty, supra note 1, art. VIII.

^{245.} Treaties, U.N. OFF. FOR OUTER SPACE AFF., https://www.unoosa.org/oosa/en/aboutus/ history/treaties.html (last visited Oct. 6, 2022).

^{246.} Apart from the OST, the four other space treaties were "adopted to reinforce the framework set by [it]." *Id.*; Outer Space Treaty, *supra* note 1, art. VI (noting that the "appropriate State Party to the Treaty" must authorize and monitor non-governmental entities' space activities).

^{247.} See supra note 26 (discussing business practices affecting global industry) and *infra* note 325 (discussing ties with the UN).

^{248. 70} Ways the UN Makes a Difference, U.N., https://www.un.org/un70/en/content/70ways/index.html (last visited Dec. 16, 2022).

^{249.} Id.

^{250.} See Committee on the Peaceful Uses of Outer Space and Its Subcommittees, U.N. OFF. FOR OUTER SPACE AFF., http://www.unoosa.org/oosa/en/ourwork/copuos/comm-subcomms.html (last visited Oct. 6, 2022).

since its creation in 1959 from 24 to 95 members, making the Committee one of the largest in the entire UN.²⁵¹ Its two subcommittees meet every year to discuss scientific, technical, and legal questions regarding space exploration.²⁵² The mandate of the COPUOS and its subcommittees aims at "strengthening the international legal regime governing outer space" and supports efforts at all levels to "maximize the benefits of the use of space science and technology and their applications."253 COPUOS' role as a forum to monitor developments related to outer space places the UN in the unique position to serve as the principal body for the evolution and development of space law.²⁵⁴ The UN Office for Outer Space Affairs (UNOOSA) supports the work of COPUOS by implementing a "multifaceted [program] that covers the scientific, technical, legal, and policy aspects of space-related activities."255 Because of its ability to shape inclusive regulatory and legal policies concerning private actors' use and exploration of outer space, this hugely beneficial forum should be incorporated into a space court structure.

Other intergovernmental organizations handling space issues should be incorporated into a space convention and court structure as well. For instance, the International Telecommunication Union (ITU) oversees international cooperation regarding space communication, and the World Intellectual Property Organization (WIPO) is likely to take on a regulatory role in the future regarding inventions that are made in space.²⁵⁶ The UN Educational, Scientific and Cultural Organization (UNESCO) promotes the ethics of science and technology, including within space policies.²⁵⁷ Finally, the International Institute for the Unification of Private Law (UNIDROIT) seeks to help the financing of space assets.²⁵⁸ Each of these entities can shape the development of future space laws that are applicable to private actors, including liability

^{251.} Members of the Committee on the Peaceful Uses of Outer Space, U.N. OFF. FOR OUTER SPACE AFF., http://www.unoosa.org/oosa/en/members/index.html (last visited Oct. 6, 2022).

^{252.} Committee on the Peaceful Uses of Outer Space and Its Subcommittees, supra note 250.

^{253.} Id.

^{254.} Nandasiri Jasentuliyana, *The Lawmaking Process in the United Nations, in* SPACE LAW: DEVELOPMENT AND SCOPE 33, 33 (Nandasiri Jasentuliyana ed., Praeger 1992).

^{255.} See Committee on the Peaceful Uses of Outer Space and Its Subcommittees, supra note 250.

^{256.} Ingo Baumann, *Diversification of Space Law, in* SPACE LAW: CURRENT PROBLEMS AND PERSPECTIVES FOR FUTURE REGULATION 47, 49, 52 (Marietta Benko et al. eds., 2005); Henry R. Herzfeld, *International Organizations in Civil Space Affairs, in* THE POLITICS OF SPACE: A SURVEY: INTERNATIONAL ORGANIZATIONS IN CIVIL SPACE AFFAIRS 129, 134 (Eligar Sadeh ed., 2011).

^{257.} See Comm. on the Peaceful Uses of Outer Space, Rep. of the Legal Subcomm. on Its Forty-Second Session, U.N. Doc. A/AC.105/C.2/L.240 (2003).

^{258.} Baumann, supra note 256, at 52; Herzfeld, supra note 256, at 134.

to other actors, standing required to bring claims, and enforcement of judgments.

V. A PROPOSAL FOR AN UNITED NATIONS CONVENTION ON THE LAW OF OUTER SPACE

Because the number of parties engaging in outer space activities will inevitably grow, international cooperation remains essential for any legal space regime's success. Calling an international convention and granting observer status to non-governmental international organizations are two ways the UN can help in creating a dedicated space court and provide the basis for long-term stability in space law. An envisioned convention process would mirror the UN Convention of the Law of the Sea (UNCLOS).²⁵⁹ To avoid interfering with a nation's sovereignty, any jurisdiction of a space court would be necessarily paradoxical, broadly covering all disputes in space, yet having no authority over actions on Earth. Such jurisdiction could only be achieved through specific language in the convention documents to this effect. It would require Member-States, by virtue of signing the treaty, to release all claims of authority over persons and activities beyond some arbitrary delineation, unless the Member-State engages in or sponsors the activity. It would also require Member-States to recognize and acquiesce to the authority of the space court in adjudicating all outer space disputes. Balancing the power between nations and private entities' opposing interests, both in the convention process and in a space court's jurisdiction, would help calm the political tensions associated with increased international authority. The UN is uniquely positioned to achieve this balance because of its respected authority and status as the preeminent international governing body. An UN-sponsored convention is therefore the best option to achieve a unified space court.

A. From Ocean Floors to Night Skies: Law of the Sea as a Model for a Space Convention

The best long-term solution for addressing future space disputes is to follow the UNCLOS approach and create a space court via UN-sponsored convention.²⁶⁰ The UNCLOS was the result of a nine-year conference to write a comprehensive ocean treaty and consisted of representatives from over 160 nations "discuss[ing] the issues, bargain[ing] and trad[ing]

^{259.} See, e.g., UNCLOS, ITLOS, https://www.itlos.org/en/main/the-tribunal/unclos/ (last visited Oct. 6, 2022) (detailing the creation of the International Tribunal for the Law of the Sea). 260. See generally UNCLOS, supra note 111.

national rights and obligations in the course of ... negotiations."²⁶¹ Following this model, the UN should call for a United Nations Convention on the Law of Outer Space (UNCLOOS) to address the changing landscape of space activity. In fact, the historical background of the UNCLOS parallels the current situation with outer space; where the call for an effective international maritime regime "came at a time when many recognized the need for updating the freedom-of-the-seas doctrine to take into account the technological changes that had altered man's relationship to the oceans,"²⁶² today private companies have developed the technology to launch themselves into space and thus are triggering the same concern.²⁶³ As with UNCLOS, upon its entry into force, a Meeting of the States Parties would be convened in accordance with the established Convention to elect members of a tribunal, address administrative tasks, and receive reports from any subsidiary bodies created by the Convention.²⁶⁴

A UNCLOOS should mandate the creation of a space court like UNCLOS did with the ITLOS.²⁶⁵ This space court would be a permanent, independent judicial body like the ITLOS²⁶⁶ or ICC.²⁶⁷ Although both ITLOS and ICC are independent from the UN, they maintain close ties.²⁶⁸ A similar arrangement would benefit both the UN and a space court, and the Court could be granted observer status for the same reason that the ILTOS was.²⁶⁹ Given the structure of UNOOSA, which helps countries benefit from space technology and to understand international space law fundamentals, it seems prudent for there to be close ties between an independent space court and UNOOSA (as

263. See supra Part II.C (discussing private space actors).

266. Id.

^{261.} See The United Nations Convention on the Law of the Sea (A Historical Perspective), supra note 109.

^{262.} Id.

^{264.} See, e.g., Meetings of States Parties to the 1982 United Nations Convention on the Law of the Sea, UNCLOS, https://www.un.org/depts/los/meeting_states_parties/meeting_states_parties.htm (last updated Dec. 22, 2021).

^{265.} See UNCLOS, supra note 111, annex VI (incorporating the Statute of the International Tribunal for the Law of the Sea).

^{267.} See Rome Statute of the International Criminal Court, July 17, 1998, 2187 U.N.T.S. 38544 [hereinafter Rome Statute]; G.A. Res. 58/874, UN-ICC Relationship Agreement (Aug. 20, 2004).

^{268.} See UN-ITLOS Agreement, supra note 121; UN-ICC Relationship Agreement, supra note 267 (discussing those courts' relationship with the UN).

^{269.} G.A. Res. 51/204, *supra* note 125; *see* discussion *infra* Part V.B (describing benefits of observer status).

the UN body with primary authority over space activities).²⁷⁰ Also, UNCLOOS attendees could design the composition of a space court to reflect an equitable geographical distribution, as seen in the ICJ.²⁷¹ Such a move would ensure the "representation" of nations currently lacking space-faring capabilities but which may be attained in the future.²⁷² Drafters of a statute for a new space court have a plethora of established examples to draw from, which should make the process much quicker and lead to a relatively quick establishment of the much-needed space court.²⁷³

Another objective for the space convention would be to establish a clearly defined jurisdiction that treats all parties operating in outer space equally. Such jurisdiction would encompass both personal and subject matter jurisdiction over actors and activities and would begin beyond some agreed-upon delineation, such as low Earth orbit (LEO).²⁷⁴ This means that nations must agree to yield a degree of their sovereignty-including authority over persons and actions-while operating in outer space. Nations would essentially be placing any authoritative claims in abeyance and recognizing the international outer space jurisdiction. Such a limitation may appear to be a big obstacle to overcome, but this structure benefits the long-term interests of a nation and its citizens and corporations. The jurisdiction of a space court would thus apply regardless of nationality; for example, disputes between two United States citizens (or corporations, or a combination of the two) would be adjudicated the same as if one of the parties was from a different country. However, the space convention should, as a practical matter, include a limited choice-of-law provision that would

^{270.} See supra Part IV.C (discussing the work of the Committee on the Peaceful Uses of Outer Space). A conference would bring the most robust and comprehensive changes to a space regime, but because of the diplomatic process requiring a majority or consensus of members to agree to them, the pace of change may be slow.

^{271.} See United Nations, What is the International Court of Justice? The Role and Activities of the ICJ, at 04:52, YOUTUBE (Oct. 24, 2017), https://www.youtube.com/watch?v=DME-wfbt08c; see also Current Members, I.C.J., https://www.icj-cij.org/en/current-members (last visited Oct. 30, 2021) (listing the current members of the ICJ and their respective nationality).

^{272.} See Manfred Lachs, Some Reflections on the Nationality of Judges of the International Court of Justice, 4 PACE Y.B. INT'L L. 49, 53 (1992). Of course, justices of a space court would be impartial and would not "represent" the interests of any group. See id. at 55 n.10.

^{273.} Statutes for the ICJ, ICC, and ITLOS have all been created and approved through an international process, so it is unlikely that previously agreed upon ideas would suddenly be opposed to in a new space court statute.

^{274.} See Andrew May, Low Earth Orbit: Definition, Theory and Facts, SPACE.COM (May 30, 2022), https://www.space.com/low-earth-orbit (defining low Earth orbit as less than 1,200 miles or 2, 000 kilometers from Earth).

allow parties of the same nationality adjudicate their claim in a domestic court. Giving up jurisdiction is not a new concept—at the national level in the United States, for example, "[w]hen a State enters the Union, it surrenders certain sovereign prerogatives."²⁷⁵ At the international level, nations self-impose limitations on their actions when they enter treaties or conventions.²⁷⁶ When a state enters the jurisdiction of outer space, its sovereignty as to its own actions as well as the actions of its citizens would be limited by the document establishing a space court.²⁷⁷

Placing all space actors—whether governmental, non-governmental, or private—on the same playing field is necessary to balance rights and safeguard treatment in the eyes of the law.²⁷⁸ Of course, this would affect certain provisions of the Outer Space Treaty.²⁷⁹ For example, Article VI requires a nation to exercise continued supervision and control over national activities of both governmental and nongovernmental entities.²⁸⁰ A space court's jurisdictional scheme would not entirely remove the need for this provision as it might affect state-liability, but is rendered mostly moot.²⁸¹ Article VIII of the Treaty, which states that nations in space retain jurisdiction over an object and any people inside, would be likewise nullified.²⁸²

The goals of a space court would reaffirm the purpose and principles of the UN Charter: to maintain international peace and security, to take effective collective measures to prevent and remove threats to peace, to promote international cooperation, and to encourage progressive development of international law and its codification.²⁸³ These goals would be effectuated through two separate powers vested in the UN: those of granting observer status and of convening a conference.²⁸⁴

^{275.} Massachusetts v. EPA, 549 U.S. 497, 519 (2007). There are clearly differences between nations giving up sovereignty to a global international body versus a state giving up sovereignty to a national government, but the principle remains the same.

^{276.} James W. Garner, *Limitations on National Sovereignty in International Relations*, 19 AM. POL. SCI. REV. 1, 16–17 (1925).

^{277.} See id. at 17 (discussing the effect of international agreements to limit a nation's freedom of action).

^{278.} Outer Space Treaty, *supra* note 1, art. I (agreeing that exploration and use of outer space shall be for the benefit of, and in the interests of, all countries and shall be province of all mankind).

^{279.} Id. art. VI.

^{280.} Id.

^{281.} See supra note 83 (discussing the continuing supervision requirement).

^{282.} Outer Space Treaty, supra note 1, art. VIII.

^{283.} U.N. Charter arts. 1, 13.

^{284.} See supra note 220 and accompanying text (explaining the UN's authority to grant observer status).

Looking to developments in international business provides more support to a conference approach. As previously noted, the General Assembly granted observer status to the International Chamber of Commerce, which gives private business a seat at the UN table.²⁸⁵ The Chamber's development of the widely-accepted UCP for conducting international business, paired with its unique observer status, helps the collective international community-national and non-governmentalachieve lasting cooperation and future development.²⁸⁶ This is important moving forward because the UN's 2030 Agenda focuses on the private sector for driving sustainable development, but also because of "growing populist and protectionist forces within the global economy."287 The resolution to confer the status noted the need, stressed by the UN, of giving "greater opportunities to the business community to contribute" to the goals and programs of the UN.²⁸⁸ Surely this need extends beyond the business community, and the UN has essentially admitted its recognition of the benefits of having closer ties with private industry.

UNCLOOS should look to every available process to incorporate agreements that would bind parties to the jurisdiction of a space court. Future developments in the outer space industry may lead to the creation of multiparty agreements like the ICAO.²⁸⁹ The UN should be called upon to help any yet-to-be-determined Specialized Agencies be included in working closely with the UNCLOOS. Also, and in keeping with the existing UN structure, the proposed space court should adopt and incorporate an enforcement structure based on existing mechanisms.²⁹⁰ One such enforcement method lies in the Optional Rules for Arbitration of Disputes Relating to Outer Space Activities (the Rules).²⁹¹ The Arbitration Rules adopted by the UN Commission on International Trade Law (UNCITRAL) should also be included, since there will undoubtedly be new business endeavors in outer space in the near future.²⁹²

^{285.} See supra notes 25–26 and accompanying text (discussing the effect of the International Chamber of Commerce's observer status).

^{286.} See supra note 24 (discussing the UCP as the industry standard).

^{287.} *ICC Granted UN Observer Status*, INT'L CHAMBER COM. (Dec. 13, 2016), https://iccwbo.org/ media-wall/news-speeches/un-general-assembly-grants-observer-status-international-chambercommerce-historic-decision/. The move reflects the UN's commitment to strengthening its relationship with the private sector. *Id.*

^{288.} G.A. Res. 71/156 (Nov. 11, 2016).

^{289.} See ICAO, supra note 28 (discussing the ICAO's Specialized Agency status with the UN).

^{290.} Listner, supra note 83.

^{291.} Id. (discussing the Optional Rules).

^{292.} See generally UNCITRAL Arbitration Rules, U.N., https://uncitral.un.org/en/texts/ arbitration/contractualtexts/arbitration (last visited Oct. 6, 2022); see also Listner, supra note 83,

Other entities may provide a valuable roadmap for handling space disputes. For example, as the "world's leading institution devoted to international investment dispute settlement," ICSID provides for dispute settlement through arbitration, conciliation, or fact-finding.²⁹³ By signing onto the ICSID Convention, nations (called Contracting States) bind all private actors within their jurisdiction to the Convention.²⁹⁴ A similar process could be followed for a UNCLOOS to address private space disputes. An outer space convention could easily include language binding signatories to the existing space treaties as well as confer jurisdiction to resolve disputes to a space court, which follows the mechanism laid out in the ITLOS.²⁹⁵

Nations voluntarily assisting with enforcement would not interfere with their sovereign authority because assistance would be discretionary. As previously discussed, the space jurisdiction would be specifically authorized and delineated by language in the convention. A similar structure is already in place within the ICC.²⁹⁶ In fact, incorporating the enforcement mechanisms for the ICC would benefit a space court since these mechanisms were negotiated within the UN and are widely adopted by member states.²⁹⁷ As explained in Part III.B, the Rome Statute established the ICC in part to "contribute to the prevention of [the worst] crimes, and to secure the peace, security and well-being of the world, in conformity with the purposes and principles of the Charter of the United Nations."²⁹⁸

The vast expanse of outer space presents unique challenges for a UNCLOOS, but relevant aspects of the law of the sea model should be replicated for outer space. Access to a tribunal with jurisdiction to settle disputes for public and private parties is one such aspect. Another is the comprehensiveness of the UNCLOS; the same comprehensiveness is needed to update the space regime to include private actors as well as to incorporate material features of space.

n.4 (UNICITRAL is "the core legal body of the United Nations dealing with rules of commercial international law.").

^{293.} See supra note 193 (discussing ICSID arbitration services).

^{294.} Convention on the Settlement of Investment Disputes between States and Nationals of Other States, Oct. 14, 1966, 575 U.N.T.S. 159, https://icsid.worldbank.org/sites/default/files/ICSID%20Convention%20English.pdf.

^{295.} See UNCLOS, supra note 111.

^{296.} See Rome Statute, supra note 267, pt. 9.

^{297.} See supra Part III.A (discussing the UN General Assembly parliamentary process).

^{298.} United Nations Diplomatic Conference of Plenipotentiaries on the Establishment of an International Criminal Court, U.N. CODIFICATION DIV. PUBL'N: DIPLOMATIC CONF., https://legal.un.org/diplomaticconferences/1998_icc/ (last visited Oct. 6, 2022).

B. A Seat at the Table: Granting UN Observer Status to the Private Sector

More international organizations should be granted observer status and be allowed to participate in UN sessions regarding outer space activities. Observers have "free access to most meetings and relevant documentation" and participate in the "work and annual sessions of the General Assembly."299 The precedent for including non-governmental entities as observers was set in December 2016 when the UN granted observer status to the International Chamber of Commerce.³⁰⁰ This puts private observers in a unique position on the world stage, bridging the gap between the private and public sectors and allowing private parties to influence international affairs.³⁰¹ Granting the same status to space organizations would be a move in the right direction to close the jurisdictional gaps that currently exist, namely the uncertainty of appropriation of space resources by private actors.³⁰² As beneficial as expanding observer status would be, that would not be sufficient by itself to address the overall needs of a space court. Including this grant of status should be part of a convention process so that nongovernmental organizations may participate in a convention and provide input of private sector interests.

The path to a Convention of the Law of Outer Space runs through COPUOS, which is no stranger to observers. Since its establishment, membership in COPUOS has exploded; initially having eighteen members, the Committee has grown to one hundred members as of 2021.³⁰³ Since 1962, forty-five observer organizations have joined COPUOS, with sixteen observers joining within the last decade alone.³⁰⁴ Should the General Assembly adopt a report from COPUOS on the need to

^{299.} About Permanent Observers: What is a Permanent Observer?, U.N., https://www.un.org/en/about-us/about-permanent-observers (last visited Oct. 6, 2022).

^{300.} See Dubovec, supra note 25 (discussing the UCP and its reach in international business); Business and the United Nations, INT'L CHAMBER COM., https://iccwbo.org/global-issues-trends/global-governance/business-and-the-united-nations/ (last visited Oct. 6, 2022).

^{301.} This is significant because it "provides world business with a direct voice into the UN agenda for the first time: providing an opportunity to shape global policies that work with the private sector." *Business and the United Nations, supra* note 300.

^{302.} See discussion supra notes 140, 162, 184, and accompanying text (discussing jurisdictional gaps in current space law).

^{303.} Committee on the Peaceful Uses of Outer Space: Membership Evolution, U.N. OFF. FOR OUTER SPACE AFF., https://www.unoosa.org/oosa/en/ourwork/copuos/members/evolution.html (last visited Oct. 6, 2022).

^{304.} Committee on the Peaceful Uses of Outer Space: Observer Organizations, UN OFF. FOR OUTER SPACE AFF., https://www.unoosa.org/oosa/en/ourwork/copuos/members/copuos-observers. html (last visited Oct. 6, 2022).

convene a convention for outer space, it would not be unusual for the convention to be opened to current COPUOS observers or to other specialized agencies. In fact, interested non-government organizations and specialized agencies were invited to, and participated in, the conventions leading to UNCLOS I and UNCLOS III.³⁰⁵ Inclusion of these observers throughout the convention process is of paramount importance to ensure private space interests are heard.

C. The Political Feasibility of a Space Convention

The Outer Space Treaty of 1967 overcame the politics of the day to be ratified by Member States of the General Assembly, and its underlying principles are still applicable today. The global community still wants peaceful exploration and use of space for the same reasons that the treaty was adopted originally-to avoid national appropriation of space, war, and nuclear weapons being placed in orbit or on celestial bodies.³⁰⁶ Although the political landscape may change, these principles should not. For example, one of the principles in the preamble of the OST speaks to the desire for states "to contribute to broad international co-operation in the ... legal aspects of the exploration and use of outer space for peaceful purposes."307 Efficient operation of a space court will require the cooperation of nations and the establishment of a "space jurisdiction" that limits the impact on a nation's activities for the benefit of all space actors. If cooperative principles were politically feasible when the OST was adopted, incorporating these agreed-upon principles into a space court should lend support to its adoption.³⁰⁸

Undoubtedly, there will be hurdles to overcome in reaching the requisite ratifications for an outer space convention. One potential hurdle is the veto power of the UN Security Council's five permanent members.³⁰⁹ Hopefully, the use of the veto by permanent members would not be a factor since the new space court proposal impacts the global community as a whole and is not limited to nations. By not favoring any nation or their allies over another, and by not seeking to authorize

^{305.} See G.A. Res. 3029 (XXVII) A, ¶¶ 6, 8 (Dec. 18, 1972).

^{306.} Meetings Coverage, Gen. Assembly, Delegates Approve 5 Draft Resolutions, as First Committee Takes Action on Peaceful Use, Non-Weaponization of Outer Space, Chemical Weapons, U.N. Doc. GA/DIS/3676 (Nov. 1, 2021), https://www.un.org/press/en/2021/gadis3676.doc.htm.

^{307.} Outer Space Treaty, supra note 1, pmbl.

^{308.} See id. (detailing the principles of the treaty).

^{309.} See U.N. Charter art. 23 ¶ 1; see also The UN Security Council, COUNCIL ON FOREIGN RELS., https://www.cfr.org/backgrounder/un-security-council (discussing the veto power and criticisms of its use) (last updated Aug. 12, 2021, 4:30 PM).

peacekeeping operations in conflicts affecting a region's alliance with a permanent member, the incentive for permanent members to veto the proposal is arguably lessened.

Further, space law principles are aimed at ensuring a rational, responsible approach to the exploration and use of outer space for the benefit and in the interests of all mankind.³¹⁰ As an extension of these principles, a space court should not be seen as a threat to national interests, one potential justification for vetoing its adoption.³¹¹ If, during UNCLOOS negotiations, this argument was made on the basis of nations ceding jurisdiction, it would be important to focus on the longterm goals of the UN space treaties, the interests of all space parties, and the opportunity for certainty that comes with a separate space court in place. Also, following the ICJ's structure, an equitable geographic distribution of a space court could provide inclusivity among member nations.³¹² Public perception can be a driving force in the ratification of the proposed UNCLOOS in other ways as well; pressure from news media, private citizens, private industries, and politicians could make it difficult for a Member to justify not voting for laws that would protect their citizens through a venue to adjudicate disputes.³¹³

A separate "space jurisdiction" mitigates the impact of a space court on the existing international framework. Such a jurisdiction is nothing new; Articles VI and VII of the Outer Space Treaty and the Liability Convention all deal with this subject.³¹⁴ However, these provisions did not contemplate widespread private space activity, and they do not grant standing to private entities; instead, private entities are reliant on national governments to espouse their claim through other UN dispute resolution processes. Alternatively, a private entity may bring a claim against another country in their nation's court system, but that nation would be unlikely to submit to a sister sovereign's jurisdiction or

^{310.} See G.A. Res. 1962 (XVIII), supra note 223 (listing the legal principles underlying space exploration and use).

^{311.} Advisory opinions of the ICJ have established that if a Security Council Member uses a veto to block a resolution, the General Assembly may invoke an implied "secondary" authority to override the veto. *See* Certain Expenses of the United Nations, Advisory Opinion, 1962 I.C.J. 151, 163 (July 20, 1962). The judges reasoned that since Article 24 of the UN Charter confers "primary responsibility" on the Security Council (to maintain peace and security), the General Assembly must retain a "secondary responsibility". *Id*.

^{312.} See United Nations, supra note 271.

^{313.} See Franck, supra note 202, at 610 (arguing that public opinion might persuade permanent Security Council members to limit their use of a veto).

^{314.} See Outer Space Treaty, *supra* note 1; Liability Convention, *supra* note 54 (placing international responsibility for national activities in space, including liability for damage caused by objects they launch into space).

authority. A space court's authority would be narrowly tailored to the adjudication of disputes arising from activities in outer space and would not affect a nation's sovereignty on Earth.³¹⁵ Further, this authority would not encompass Earth-based activities such as commercial launches if they occurred outside of the delineated boundary of outer space.³¹⁶ A space court automatically has jurisdiction over disputes between parties arising from activities occurring beyond a clearly established boundary line in outer space, such as low Earth orbit.³¹⁷ If a satellite is launched from Earth and later collides with a private space shuttle, the court has jurisdiction to hear a dispute, if a legal claim was raised. This limitation de-incentivizes the permanent Security Council members from vetoing a space court's creation because it would vprovide clarity and certainty of where space disputes could be adjudicated.³¹⁸

Narrowly tailoring and delineating the jurisdiction increases the likelihood that a space court will be adopted because during the convention process, nations would have agreed to limitations on their authority in outer space.³¹⁹ Existing space treaties would not be significantly affected since a space court encompasses their purposes and goals, as well as those of the UN Charter.³²⁰ If the existing space treaties were amended to explicitly allow nations to regulate their private space companies and citizens, the power imbalance between nations and private entities operating in space would subject the latter group to an

^{315.} See U.N. Charter art. 2, \P 1 ("The Organization is based on the principle of the sovereign equality of all its Members.").

^{316.} See, e.g., 14 C.F.R. Ch. III, pts. 400–460 (2021) (Federal Aviation Administration commercial space transportation regulations); SOBRANIE AKTOV PREZIDENTA I PRAVITEL'STVA ROSSII±SKOI± FEDERATSII [SAPP] [Collection of Acts of the President and Government of the Russian Federation] 1993, No. 5663-1 ("About Space Activity"); Outer Space Act 1986 c. 38 (UK).

^{317.} A trigger mechanism could be written into a space court's statute, like those found within the statutes of the ICJ and ICC. *See* ICJ Statute, *supra* note 17, art. 36; Rome Statute, *supra* note 267, art. 13.

^{318.} This Article does not advocate for amending the UN Charter to remove the veto power, for which there is virtually no possibility for success. *See* Franck, *supra* note 202, at 609 (noting that abolishing the veto through amending the Charter requires the consent of those nations which have veto power).

^{319.} Outer Space Treaty, supra note 1, art. II.

^{320.} See, e.g., U.N. Charter art. 1 ("[T]o achieve international co-operation in solving international problems of an economic, social, cultural, or humanitarian character, and in promoting and encouraging respect for human rights and for fundamental freedoms for all. . . ."); Outer Space Treaty, *supra* note 1, art. I (activities 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").

inferior legal status,³²¹ which seemingly implicates the non-appropriation doctrine of the OST and undermines the doctrine of fairness under the law.³²²

Under this expanded treaty approach, the same problems facing international humanitarian law, i.e., bad private actors receiving state-assistance, are likely to follow into outer space. Because nations cannot appropriate resources, celestial bodies, or raw materials found in outer space, limiting the jurisdiction of nations regarding space disputes between parties does not affect national interests in any significant way—states are still free to use and explore outer space, to conduct scientific research and encourage international cooperation.³²³ Imagine if a state-funded terrorist group gained access to outer space and later commit acts of terror. Would these terrorists be considered citizens under a treaty allowing for regulation of private actors? Would the abetting nation be strictly liable for their actions, or would liability be shared with the birth nation if different?³²⁴ Jurisdiction conferred on the proposed Space Court would allow individuals to bring a claim against the group instead of having to rely on nations to do so for them.³²⁵

323. Non-state armed groups are "dissident armed forces or other organized armed groups', who fight regular armed forces or against each other on the territory of one or several States." *Practical Guide to Humanitarian Law, supra* note 201; Protocol Additional to the Geneva Conventions of 12 August 1949 and relating to the Protection of Victims of Non-International Armed Conflicts (Protocol II) art. 1.1, June 8, 1977, 1125 U.N.T.S. 609.

324. *See, e.g.,* Pfaltzgraff, Jr., *supra* note 198, at 46 ("[F]uture challenges may come from terrorist groups capable . . . of launching an electromagnetic pulse attack that would destroy or disable vital electronic infrastructures. . . .").

325. An analysis of potential geopolitical conflicts is impossible and not within the scope of this Article. In the hypothetical event of a terroristic attack in space, national government laws could still apply; a space court would benefit from a procedural process that allows private parties to adjudicate a terrorism claim through their nation's legal structure. This process allows the Court flexibility to adopt similar processes in the future. *See Government Support*, U.N.: VICTIMS OF TERRORISM SUPP. PORTAL, https://www.un.org/victimsofterrorism/en/government-support (last visited Oct. 6, 2022) (regarding remedies for victims of terrorism).

^{321.} In the event of a dispute between a private entity and a government, the government could rely on the principle of sovereign immunity to avoid lawsuits. *See* G.A. Res. A/RES/59/38, United Nations Convention on Jurisdictional Immunities of States and Their Property (Dec. 16, 2004), https://documents-dds-ny.un.org/doc/UNDOC/GEN/N04/478/54/PDF/N0447854. pdf?OpenElement.

^{322.} See Outer Space Treaty, *supra* note 1, pmbl (signatories were convinced that the Treaty "w [ould] further the purposes and principles of the Charter of the United Nations"); *id.* art. I (labelling outer space the "province of all mankind"). The phrase "all mankind" is unambiguous; outer space was never intended to be the province of *nations*. A preferred status for nation-states, with greater legal authority, arguably appropriates outer space because such a status monopolizes space by means of use. Outer Space Treaty, *supra* note 1, art. II.

Admittedly, there may be several reasons why a Member State would hesitate to sign onto any agreement that creates a separate space court. Such a court could be seen as potentially adverse to long-term national interests.³²⁶ Or some Members may not wish to be bound to a judicial body they have no intention of adhering to.³²⁷ These Members may believe a space court would give the UN expansive powers over their own national sovereignty, or they may have reservations about the enforceability of judicial decisions issued by the court.³²⁸ Some Members may feel that establishing a space court would be insufficient because there is no collective body of international law and thus the court would have to decide what source of law to use, resulting in inconsistent judgments.³²⁹ To parse through any speculation, looking at draft decisions or resolutions that have not been adopted could yield better insight into reasons why Members decided not to vote in favor of a proposal.³³⁰ Expansion of an existing court's authority to include outer space matters would be unfeasible as it would likely be seen as a material deviation from its original purpose; expanding the ICI to hear cases between people, without some type of venue provision, strips nations of their ability to adjudicate a private dispute through choice-of-law.³³¹

328. E.g., AGENCE FRANCE-PRESSE, Dubai Creates 'Space Court' for Out-of-This-World Disputes, COURTHOUSE NEWS SERV. (Feb. 1, 2021), https://www.courthousenews.com/dubai-creates-space-court-for-out-of-this-world-disputes/ ("[A]s space commerce becomes more global, the complex commercial agreements that govern them 'will also require an equally innovative judicial system to keep pace.'").

329. See ICJ Statute, supra note 17, art. 38 \P 1 (discussing how the court determines which law to apply in deciding disputes).

330. UN Documentation: Overview of Voting, U.N. DAG HAMMARSKJOLD LIBR., https://research. un.org/en/docs/voting (last visited Oct. 6, 2022).

^{326.} E.g., WHITE HOUSE, UNITED STATES SPACE PRIORITIES FRAMEWORK (2021) (outlining the long term-national interests in outer space); *see also US Opposition to the International Criminal Court*, GLOB. POL'Y F., https://archive.globalpolicy.org/international-justice/the-international-criminal-court/us-opposition-to-the-icc.html (last visited Oct. 6, 2022).

^{327.} Cf. Thomas Cheney, Is it time to rethink the Moon Agreement?, CTR. FOR SPACEFARING CIVILIZATION (May 17, 2019), https://www.spacefaringcivilization.space/post/is-it-time-to-rethink-the-moon-agreement (discussing how the Moon Agreement failed to garner support from spacefaring nations due to unwillingness to act in accordance with Article 11).

VI. CONCLUSION

Recent achievements within the private spaceflight industry have made commercially viable trips into outer space a reality. The nationcentric outer space legal regime is inadequate for protecting private, non-governmental space actors and is past due for reevaluation. Instead of simply adding another voice to the growing call for an adjudicative system for outer space, this Article proposed two methods that would achieve this result: a convention called by the UN, and non-governmental organizations being granted observer status in the General Assembly.

Peaceful exploration and use of the unique domain of outer space will continue to rely on international law in the future. To ensure legal protection is given to *all* spacefarers, the UN should adopt both methods proposed in this Article for creating a space court. In doing so, the UN would lend the space court with needed authority and legitimacy. Not only would such a space court be in keeping with the purpose of the UN Charter and OST, but it is also necessary and will only grow more important. It is only through continued international cooperation that all humanity, not merely nations, will be poised for outward expansion into the universe. We look to the future by focusing on the present; that is where we find justice for the new frontier.

^{4–5 (}discussing the Court's power to "exercise its jurisdiction over persons for the most serious crimes of international concern").