**1**

Interpretation: The affirmative must defend that appropriation of outer space as a whole by private entities is unjust.

**‘The’ indicates reference to a noun as a whole**

Merriam **Webster’s 19** Online Dictionary, https://www.merriam-webster.com/dictionary/the

4 -- **used as a function word before a noun** or a substantivized adjective **to indicate reference to a group as a whole** <the elite>

**“Appropriation” means to take as property**

**Leon 18** (Amanda M., Associate, Caplin & Drysdale, JD UVA Law) "Mining for Meaning: An Examination of the Legality of Property Rights in Space Resources." Virginia Law Review, vol. 104, no. 3, May 2018, p. 497-547. HeinOnline.

**Appropriation**. The term "appropriation" also remains ambiguous. **Webster's defines** the verb "**appropriate**" **as** "**to take to oneself in exclusion of others**; **to** claim or **use as by an exclusive or pre-eminent right**; as, let no man appropriate a common benefit."16 5 Similarly, **Black's** Law Dictionary **describes "appropriate" as an act "[t]o make a thing one's own; to make a thing the subject of property**; to exercise dominion over an object to the extent, and for the purpose, of making it subserve one's own proper use or pleasure."166 Oftentimes, **appropriation refers to the setting aside of government funds, the taking of land for public purposes, or a tort of wrongfully taking another's property as one's own**. The term appropriation is often used not only with respect to real property but also with water. According to U.S. case law, a person completes an appropriation of water by diversion of the water and an application of the water to beneficial use.167 This **common use** of the term "appropriation" with respect to water **illustrates** two key points: (1) **the term applies to natural resources-e.g., water or minerals-not just real property**, **and** (2) **mining space resources and putting them to beneficial use**-e.g., selling or manufacturing the mined resources **could reasonably be interpreted as an "appropriation" of outer space**. While **the ordinary meaning of "appropriation"** reasonably **includes the taking of natural resources as well as land**, whether the drafters and parties to the OST envisioned such a broad meaning of the term remains difficult to determine with any certainty. **The prohibition against appropriation "by any other means" supports such a reading**, though**, by expanding the prohibition to other types not explicitly described**.168

**‘Of’ implies we should consider appropriation as a whole**

**CJS 78** Corpus Juris Secundum, 67, p. 200

Of: **The word "of"** is a preposition. It is a word of different meanings, and susceptible of numerous different connotations. It may be used in its possessive sense to denote possession or ownership. It may also be used as a word of identification and relation, rather than as a word of proprietorship or possession. "Of" may denote source, origin, existence, descent, or location, or it may denote that from which something issues, proceeds, or is derived. The term may **indicate the aggregate or whole of** **which the limited word or words denote a part**, or of which a part is referred to, thought of, affected, etc.

**Unjust means contrary to right and justice**

**Black’s Law Dictionary** (Black's Law Dictionary. “What Is Unjust? Definition of Unjust (Black's Law Dictionary).” The Law Dictionary, The Law Dictionary, 7 Nov. 2011, thelawdictionary.org/unjust/.)

What is UNJUST? **Contrary to right and justice**, or to the enjoyment of his rights by another, or to the standards of conduct furnished by the laws.

**Violation— the word “appropriation” is only qualified by the words “outer space” – no other specification is permitted**

**Ellis 53** Judge Advocate in the United States Army, “United States. v. Private Frank Taylor, Jr.”, United States Army Board of Review, 11 C.M.R. 428; 1953 CMR LEXIS 1428, 7-31, Lexis

Appellate defense counsel argued orally that many facts indicated the United States was not at war, for example: there has been no declaration of war; the Coast Guard is still under the supervision of the Treasury Department instead of the Navy Department as it usually is during war; here in the United States, Armed Forces personnel are allowed to wear civilian clothes during off-duty hours; it is not the policy to try Department of the Army civilians serving with the Army in the field in the United States by courts-martial; the various Army posts throughout the United States are still open to public visitation; many reservists and National Guard units are not on active service; and the Table of Maximum Punishments had not been suspended for offenses committed in the United States. He contended that the ratio of the cases cited in support of the war status of the United States was limited to the locale of the hostilities, Korea and its adjacent [\*\*6]  waters, and was inoperative on offenses committed in the United States. Finally, he anchored his argument on the interpretation to be given the language in Article 43f(1) (post) of the Code. He conceded arguendo that the offense at bar fell within the purview of this language, being a fraud against a United States agency, the Army, but reasoned that the subject language contemplated and embraced only "hostilities as proclaimed by the President or by a Joint Resolution of Congress." With this interpretation the board of review cannot agree. **The preposition "of" before the word "hostilities" shows plainly that the phrase "of hostilities" is adjectival, qualifying and limiting the word "termination".** The phrase "termination of hostilities" is in turn modified by the participial phrase "as proclaimed." In our interpretation it is the "termination of hostilities" that must be proclaimed, and such proclamation provides the initial date of a three-year period in which the suspension of the statute of limitations continues to operate rather than determines the date of the beginning of the original suspension (emphasis supplied).

**Vote Neg:**

**1] Predictable Limits – there’s hundreds of ways in which the affirmative can restrict appropriation in outer space – they can make fines, penalize companies, or make CEOs do a notes app apology on twitter. Their model also lets them selectively restrict poor forms of appropriation and shift to better forms of appropriation which allows the aff to say appropriation good and creates a bidirectional topic that is impossible to negate.**

**2] Topic ed – Bans are one of the most common and is most germane to the literature – increases the amount of ground and ability to have deep debates on the model which the majority of the literature is centered around as opposed to an irrelevant and vague model that kills critical thinking abilities.**

DTD

CI

No rvi – baiting and no reason why being fair\

**2**

**The meta ethic is consistency with empiricism. Prefer-**

**1] Non-natural moral facts are epistemically inaccessible**

**Papinau ’07** (David [David Papineau is an academic philosopher. He works as Professor of Philosophy of Science at King's College London, having previously taught for several years at Cambridge University and been a fellow of Robinson College, Cambridge], “Naturalism”. [http://plato.stanford.edu/entries/naturalism/](http://plato.stanford.edu/entries/naturalism/)) 2007)

Moore took this argument to show that moral facts comprise a distinct species of non-natural fact. However, any such non-naturalist view of morality faces immediate difficulties, deriving ultimately from the kind of causal closure thesis discussed above. If **all physical effects are due to a limited range of natural causes, and if moral facts lie outside this range, then it follow that moral facts can never make any difference to what happens in the physical world** (Harman, 1986). At first sight **this** may seem tolerable (perhaps moral facts indeed don't have any physical effects). But it **has** **very awkward epistemological consequences.** For beings like us, **knowledge of the spatiotemporal world is mediated by physical processes involving our sense organs and cognitive systems. If moral facts cannot influence the physical world, then it is hard to see how we can have any knowledge of them.**

**2] Bindingness- only pursuing pleasure and avoiding pain can motivate action consistently- no external system of ethics has anything intrinsic that dictate it be followed. Chemical and biological responses to certain experiences provide objective markers of pleasure and pain while maximizing deontological ethical principles are unverifiable.**

**3] Reject calc idicts:**

            a. Get this: We don’t have to be a 100% certain something will happen again. We just need to be generally accurate – which policymakers, social scientists, researcehrs have been doing for centruies.

b. decuatio circular – only way you know reason is true is because of reason – or because of induction which means it collapses to

**Thus, the standard is maximizing expected utility. Prefer-**

**1] Pleasure/pain is intrinsically valuable**

**Moen 16** [Ole Martin Moen, Research Fellow in Philosophy at University of Oslo “An Argument for Hedonism” Journal of Value Inquiry (Springer), 50 (2) 2016: 267–281] SJDI

Let us start by observing, empirically, that a widely shared judgment about intrinsic value and disvalue is that **pleasure is intrinsically valuable and pain is intrinsically disvaluable**. On virtually any proposed list of intrinsic values and disvalues (we will look at some of them below), pleasure is included among the intrinsic values and pain among the intrinsic disvalues. This inclusion makes intuitive sense, moreover, for there is something **undeniably good about** the way **pleasure** feels and something undeniably bad about the way pain feels, and neither the goodness of pleasure nor the badness of pain seems to be exhausted by the further effects that these experiences might have. “Pleasure” and “pain” are here understood inclusively, as encompassing anything hedonically positive and anything hedonically negative.2 The special value statuses of pleasure and pain are manifested in how we treat these experiences in our everyday reasoning about values. If you tell me that you are heading for the convenience store, I might ask: “What for?” This is a reasonable question, for when you go to the convenience store you usually do so, not merely for the sake of going to the convenience store, but for the sake of achieving something further that you deem to be valuable. You might answer, for example: “To buy soda.” This answer makes sense, for soda is a nice thing and you can get it at the convenience store. I might further inquire, however: “What is buying the soda good for?” This further question can also be a reasonable one, for it need not be obvious why you want the soda. You might answer: “Well, I want it for the pleasure of drinking it.” If I then proceed by asking “But what is the pleasure of drinking the soda good for?” the discussion is likely to reach an awkward end. The reason is that the **pleasure is not good for anything further**; it is simply that for which going to the convenience store and buying the soda is good.3 As Aristotle observes: “We never ask [a man] what his end is in being pleased, because we assume that pleasure is choice worthy in itself.”4 Presumably, a similar story can be told in the case of pains, for if someone says “This is painful!” we never respond by asking: “And why is that a problem?” We take for granted that if something is painful, we have a sufficient explanation of why it is bad. If we are onto something in our everyday reasoning about values, it seems that pleasure and pain are both places where we reach the **end of the line** in matters of **value.**

**1] Existential risks are categorically different---even if they win that the vast majority of people would die, total collapse is an entirely different ethical category---the infinite range of scenarios for total extinction mean try or die is decisively neg**

**Baum 15**

Seth D. Baum, PhD in geography from Pennsylvania State University, is Executive Director of the Global Catastrophic Risk Institute, “Winter-Safe Deterrence: The Risk of Nuclear Winter and Its Challenge to Deterrence, Contemporary Security Policy, 36(1): 123-14, http://www.tandfonline.com/10.1080/13523260.2015.1012346

Here it is important to bring in the ethics of global catastrophic risk. A global catastrophe is an event that causes great harm to **the entirety of global human civilization**. Catastrophes of this magnitude take on a **special ethical significance**. Carl Sagan was perhaps the first to recognize this in his own discussion of nuclear winter. The astronomer saw the big picture: Hu**man extinction means the loss of all people who could ever exist into the distant future**. Contemporary scholars further understand that **even without total** human **extinction, a permanent collapse of human civilization is of comparable significance**. Ultimately what is at stake is the long-term trajectory of human civilization, its success or its failure. **Ethical obligations to future generations are fundamentally different from those to people alive today, for two reasons. First, future generations vastly outnumber the current population**. Barring catastrophe, humanity could survive for millions or even billions of years into the future. Thus anything that affects the long-term trajectory of human civilization is of **much greater consequence** than things that only affect people today. Second, **despite their great number, future generations are utterly helpless.** They cannot vote in today’s elections or trade in today’s markets, and they certainly cannot deter today’s countries with any weapons. This is absolutely unfair, but that is just how it is. **The** only **reason people must help future generations is because it is the right thing to do**. For nuclear winter policy, the basic point is that when a permanent global catastrophe could occur, a **cautious approach** is generally warranted. This means erring on the side of smaller nuclear arsenals. Any given nuclear weapons exchange has a range of possible outcomes of varying severities and probabilities**. A permanent global catastrophe is so severe of an outcome that even a small probability of it happening is a large risk and thus worth avoiding.**

**3**

**[AFF ACTORS] ought to:**

**--Announce that appropriation of lunar base heritage sites by private actors violates the Outer Space Treaty and that this is a settled matter of customary international law**

**--Announce that this action is taken pursuant to *opinio juris*** (the belief that the action is taken pursuant to a legal obligation) **and that non-compliant actors are in violation of international law**

**--Fully comply, not appropriating outer space in a manner inconsistent with these proclamations**

**Solves the Aff.**

[Fabio](https://kluwerlawonline.com/journalarticle/Air+and+Space+Law/33.3/AILA2008021) **Tronchetti 8**. Dr. Fabio Tronchetti works as a Co-Director of the Institute of Space Law and Strategy and as a Zhuoyue Associate Professor at Beihang University, “The Non–Appropriation Principle as a Structural Norm of International Law: A New Way of Interpreting Article II of the Outer Space Treaty,” Air and Space Law, Volume 33, No 3, 2008, <https://kluwerlawonline.com/journalarticle/Air+and+Space+Law/33.3/AILA2008021>, RJP, **DebateDrills**.

The non–appropriation principle represents the **fundamental rule of the space law system**. Since the beginning of the space era, it has allowed for the safe and orderly development of space activities. Nowadays, however, the **principle is under attack**. Some proposals, arguing the need for abolishing it in order to promote commercial use of outer space are undermining its relevance and threatening its role as a guiding principle for present and future space activities. This paper aims at safeguarding the **non–appropriative nature** of outer space by suggesting a **new interpretation** of the non–appropriation principle that is based on the view that this principle should be regarded as a **customary rule of international law** of a special character, namely ‘a structural norm’ of international law.

**That competes ---**

**1] Widespread support for OST overhaul means a new treaty is likely---top military leaders are pushing it.**

Theresa **Hitchens 21**. Theresa Hitchens is the Space and Air Force reporter at Breaking Defense. The former Defense News editor was a senior research associate at the University of Maryland’s Center for International and Security Studies at Maryland (CISSM). Before that, she spent six years in Geneva, Switzerland as director of the United Nations Institute for Disarmament Research (UNIDIR). “US Should Push New Space Treaty: Atlantic Council,” Breaking Defense, April 12, 2021, <https://breakingdefense.com/2021/04/us-should-push-new-space-treaty-atlantic-council/>, RJP, **DebateDrills**

WASHINGTON: The US should push hard to overhaul the **entire international legal framework** for outer space — including **replacing** the foundational [1967 Outer Space Treaty (OST),](https://breakingdefense.com/tag/outer-space-treaty/) a new report from the Atlantic Council says.

As it moves to do so, the US also should more aggressively court allies with an eye to establishing a “collective security alliance for space” among likeminded countries to “deter aggression” and defend “key resources and access.”

“The 1967 Treaty is dated. It was written, literally, in a different era,” said former Air Force Secretary Deborah Lee James in an Atlantic Council briefing today. “At present it is too broad, and in some cases it’s probably overly specific.”

The year-long study, [“The Future of Security In Space: A Thirty-Years US Strategy”](https://www.atlanticcouncil.org/wp-content/uploads/2021/04/TheFutureofSecurityinSpace.pdf)was co-chaired by James and retired Marine Corps Gen. Hoss Cartwright, former vice chair of the Joint Chiefs of Staff. In essence, it argues that the US needs to lead international efforts to **craft a new rules-based regime** to govern all space activities — from exploration to commercial ventures to military interactions. As the two argued in a recent [op-ed in Breaking D,](https://breakingdefense.com/2021/03/the-space-rush-new-us-strategy-must-bring-order-regulation/) “Great-power competition among the United States, China, and Russia has launched into outer space without rules governing the game.”

“The international law of space, centered on the 1967 Outer Space Treaty, is outdated and insufficient for a future of space in which economic activity is primary. The international community **needs a new foundational space treaty**, and the United States should precipitate its negotiation,” the study argues.

James elaborated that the idea would be to craft a more expansive treaty that covers emerging issues like debris mitigation and removal and [**commercial extraction of resources**](https://breakingdefense.com/tag/space-resource-extraction/)**from the Moon and/or asteroids**. That said, she stressed that the US should not abandon the OST — which has been signed by 193 nations — unless and until something new is there to replace it.

**2] Space law is typically treaty-based---Russian and Chinese proposals prove.**

Stephanie **Nebehay 8**. Reporter, Reuters, “China, Russia to Offer Treaty to Ban Arms in Space,” Reuters, January 26, 2008, <https://www.reuters.com/article/us-arms-space/china-russia-to-offer-treaty-to-ban-arms-in-space-idUSL2578979020080125>, RJP, **DebateDrills**

GENEVA (Reuters) - China and Russia will submit a joint proposal next month for an **international treaty** to ban the deployment of weapons **in outer space**, a senior Russian arms negotiator said on Friday.

Valery Loshchinin, Russia’s ambassador to the United Nations-sponsored Conference on Disarmament, said the **draft treaty** would be presented to the 65-member forum on February 12.

Russian Foreign Minister Sergei Lavrov is due to address the Geneva forum, which constitutes the world’s main disarmament **negotiating body**, on that day. Loshchinin gave no details on the proposal which has been circulated to some senior diplomats.

Tensions between Russia and the United States have deepened in recent years over U.S. plans to revive its stalled “Star Wars” program from the 1980s with a new generation of missile defense shields.

Nuclear and other weapons of mass destruction are banned from space under **a 1967 international treaty.** But Washington’s plans have stirred concerns about non-nuclear arms in space.

**3] Treaties are the foundation of space law.**

Sophie **Goguichvili et. al 21**. Program Associate, the Wilson Center, “The Global Legal Landscape of Space: Who Writes the Rules on the Final Frontier?” The Wilson Center, October 1, 2021, <https://www.wilsoncenter.org/article/global-legal-landscape-space-who-writes-rules-final-frontier>, RJP, **DebateDrills**

As previously mentioned, a **series of treaties** adopted by the U.N. General Assembly (UNGA) form the **foundation** of the global space governance system. The first and most significant of these treaties is the “Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space including the Moon and Other Celestial Bodies,” more commonly known as the **Outer Space Treaty**or**OST** for short (1967). The Outer Space Treaty is considered the **most comprehensive space treaty** and provides the basic framework for international space law, namely: the exploration and use of outer space for peaceful purposes by all States for the benefit of mankind (Art. I); the outlaw of national appropriation or claims of sovereignty of outer space or celestial objects (Art. II); a ban on the placement of weapons of mass destruction in orbit or on celestial bodies (Art. IV); that astronauts should be regarded as the envoys of mankind (Art. V); and that States are required to supervise the activities of their national entities (Art. VI).

**We solve better, since CIL is far superior to treaties for space AND causes follow-on.**

**Koplow, 9** – Professor of Law, Georgetown University Law Center.

David A. Koplow, “ASAT-isfaction: Customary International Law and the Regulation of Anti-Satellite Weapons,” Michigan Journal of International Law. Volume 30, Summer 2009. <http://scholarship.law.georgetown.edu/cgi/viewcontent.cgi?article=1452&context=facpub>

Finally, the Article concludes with some policy recommendations, suggesting mechanisms for the world community to press forward with autonomous efforts to promote stability and security in outer space, even in the face of recalcitrance from the leading space powers. **I would certainly support** the **negotiation** and implementation **of a comprehensive new treaty to prevent an arms race in outer space**, and a carefully drafted, widely accepted accord could accomplish much, well beyond what customary law alone could create. **But the treaty process, too**, **has costs and disadvantages**, and the world need not pursue just one of these alternatives in isolation.

**If the absence of global consensus currently inhibits agreements that countries could already sign**, perhaps **the world community can nevertheless get some "satisfaction" via the operation of CIL**, **constructing a similar** (**although not completely equivalent**) **edifice of international regulation of ASATs based simply on what countries do.**

**(**

**4 100**

**The plan requires clarifying international space law---causes strategic bargaining to extract concessions**

Alexander William **Salter 16**, Assistant Professor of Economics, Rawls College of Business, Texas Tech University, "SPACE DEBRIS: A LAW AND ECONOMICS ANALYSIS OF THE ORBITAL COMMONS", 19 STAN. TECH. L. REV. 221 (2016), https://law.stanford.edu/wp-content/uploads/2017/11/19-2-2-salter-final\_0.pdf

V. MITIGATION VS. REMOVAL

**Relying on international law to create an environment conducive to space debris removal initially seems promising**. The Virginia school of political economy has convincingly shown the importance of political-legal institutions in creating the incentives that determine whether those who act within those institutions behave cooperatively or predatorily.47 In the context of space debris, **the role of nation-states**, or their space agencies, **would be to create an international legal framework that clearly specifies the rules that will govern space debris removal** and the interactions in space more generally. **The certainty afforded by clear** and nondiscriminatory48 **rules would enable the parties of the space debris “social contract” to use efficient strategies for coping with space debris. However, this ideal result is, in practice, far from certain**. To borrow a concept from Buchanan and Tullock’s framework,49 **the costs of amending the rules in the case of international space law are exceptionally high**. Although **a social contract** is beneficial in that it prevents stronger nation-states from imposing their will on weaker nation-states, it also **creates incentives for the main spacefaring nations to block reforms that are overall welfare-enhancing but that do not sufficiently or directly benefit the stronger nations.**

The 1967 Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, including the Moon and Other Celestial Bodies (more commonly known as **the Outer Space Treaty**) **is the foundation for current international space law**.50 All major spacefaring nations are signatories. **Article VIII of this treaty is the largest legal barrier to space debris removal efforts. This article stipulates that parties to the treaty retain jurisdiction over objects they launch into space**, whether in orbit or on a celestial body such as the Moon. **This article means that American organizations, whether private firms or the government, cannot remove pieces of Chinese or Russian debris without the permission of their respective governments. Perhaps contrary to intuition, consent will probably not be easy to secure.**

**A major difficulty lies in the realization that much debris is valuable scrap material** that is already in orbit. A significant fraction of the costs associated with putting spacecraft in orbit comes from escaping Earth’s gravity well. **The presence of valuable material already in space can justifiably be claimed as a valuable resource for repairs to current spacecraft and eventual manufacturing in space**. As an example, **approximately 1,000 tons of aluminum orbit as debris from the upper stages of launch vehicles alone. Launching those materials into orbit could cost between $5 billion and $10 billion and would take several years.**51 **Another difficulty lies in the fact that no definition of space debris is currently accepted internationally. This could prove problematic for removal efforts, if there is disagreement as to whether a given object is useless space junk, or a potentially useful space asset. Although this ambiguity may appear purely semantic, resolving it does pose some legal difficulties. Doing so would require consensus among the spacefaring nations. The negotiation process for obtaining consent would be costly.**

Less obvious, but still important, is the 1972 Convention on International Liability for Damage Caused by Space Objects, normally referred to as the Liability Convention. The Liability Convention expanded on the issue of liability in Article VII of the Outer Space Treaty. **Under the Liability Convention, any government “shall be absolutely liable to pay compensation for damage caused by its space objects** on the surface of the Earth or to aircraft, and liable for damage due to its faults in space.”52 In other words, **if a US party attempts to remove debris and accidentally damages another nation’s space objects, the US government would be liable for damages**. More generally, **because launching states would bear costs associated with accidents during debris removal, those states may be unwilling to participate in or permit such efforts**. In theory, **insurance** can partly remediate the costs, but that remediation **would** still **make debris removal engagement less appealing**.

**A global effort to remediate debris would, by necessity, involve the three major spacefaring nations: the United States, Russia, and China**.53 **However, any effort would also require—at a minimum—a significant clarification and—at most —a complete overhaul of existing space law**.54 **One cannot assume that parties to the necessary political bargains would limit parleying to space-related issues. Agreements between sovereign nation-states must be self-enforcing.**55 **To secure consent, various parties to the change in the international legal-institutional framework may bargain strategically and may hold out for unrelated concessions** as a way of maximizing private surplus. **The costs, especially the decision-making costs, of changing the legal framework to secure a global response to a global commons problem are potentially quite high.**

**The US will use that opportunity to push Artemis Accords and bilateralization – undermines multilateral space law.**

**Wall 20** – Senior Space Writer with Space.com, former herpetologist and wildlife biologist, Ph.D. in evolutionary biology from the University of Sydney, Australia; citing Boley (Department of Physics and Astronomy, University of British Columbia, Vancouver) and Byers (Department of Political Science, University of British Columbia, Vancouver)

Mike Wall, 10-8-2020, “US policy could thwart sustainable space development, researchers say,” Space.com, https://www.space.com/us-space-policy-mining-artemis-accords DD

**The U**nited **S**tates' **space policy threatens the safe and sustainable development of the final frontier**, two researchers argue.

**The U.S. is pushing national rather than multilateral regulation of space mining, an approach that could have serious negative consequences**, astronomer Aaron Boley and political scientist Michael Byers, both of the University of British Columbia in Vancouver, write in a "Policy Forum" piece that was published online today (Oct. 8) in the journal Science.

Boley and Byers cite the 2015 passage of the Commercial Space Launch Competitiveness Act, which explicitly granted American companies and citizens the right to mine and sell space resources. That right was affirmed this past April in an executive order signed by President Donald Trump, they note.

The researchers also point to NASA's announcement last month that it intends to buy moon dirt and soil collected by private companies, and its plan to sign bilateral agreements with international partners that want to participate in the agency's Artemis program of crewed lunar exploration.

Artemis, one of NASA's highest-profile projects, aims to return astronauts to the moon in 2024 and establish a long-term, sustainable human presence on and around Earth's nearest neighbor by the end of the decade. Making all of this happen will require the extensive use of lunar resources, such as the water ice that lurks on the permanently shadowed floors of polar craters, NASA officials have said.

**Boley and Byers take special aim at the planned bilateral agreements, known as the Artemis Accords. In promoting them, the U.S. "is overlooking best practice with regard to the sustainable development of space,"** the researchers write.

**"Instead of pressing ahead unilaterally and bilaterally, the U**nited **S**tates **should support negotiations on space mining within the UN** [United Nations] Committee on the Peaceful Uses of Outer Space, **the same multilateral body that drafted the five major space treaties** of the 1960s and '70s," they write in the Science piece. (The most important of the five is the 1967 Outer Space Treaty, which forms the basis of international space law.)

"Meanwhile, **NASA’s actions** must be seen for what they **are** — **a concerted, strategic effort to redirect international space cooperation in favor of short-term** U.S. **commercial interests, with little regard for the risks involved**," Boley and Byers add.

The researchers worry that **the U.S. is setting an unfortunate precedent for other countries to follow, and** that space mining and other exploration **activities may** therefore **proceed in a** somewhat **careless and chaotic fashion** in the not-too-distant future.

**That returns space to might-makes-right imperial conflict.**

**O’Brien 20** – member of the International Institute of Space Law and founder of The Space Treaty Project, retired attorney and former member of the NASA-Hastings Law Project

Dennis O’Brien, 6-29-2020, “The Artemis Accords: repeating the mistakes of the Age of Exploration,” *The Space Review*, https://www.thespacereview.com/article/3975/1 DD

In the spring of 1493, the King and Queen of Spain sent an envoy to the Pope in Rome. Along with Portugal, Spain had just used its advanced sailing and navigation technology to reach “new worlds,” areas of the Earth that had not been previously discovered by Europeans. But they had a problem: they wanted to establish sovereign property rights in the lands they had discovered, but they weren’t sure they could do so under their own authority. So, they turned to the only international authority in Europe at that time, the Catholic Church, which held sway over governments from Portugal to Poland, from the Arctic to the Mediterranean. If the Church would establish a legal framework that granted them sovereignty, then those nations would be bound to recognize it.[2]

This is **the first lesson** that the current **governments** of the world **can learn from the Age of Exploration & Empire** that began five centuries ago. Even then, the most powerful nation in Europe, with the largest army and most advanced technology, realized that it could not unilaterally establish property rights or any other kind of sovereignty without the approval of an international authority. After the Church granted that authority, Spain was able to create one of the greatest empires in history. Spain and Portugal formalized the arrangement with a binding international agreement, the Treaty of Tordesillas, whose purpose was to ensure peaceful cooperation between their nations, primarily by establishing a line of demarcation that separated their areas of activity.[3]

Unfortunately, **the legal framework** so established **was based on national dominance, not multilateral international cooperation.** The grant of sovereignty was exclusive, made only to Spain and Portugal, and it required them to subjugate the “savages” in the lands they discovered by taking along Church missionaries. This exclusivity did not sit well with other nations as they also developed the technologies of exploration; it was one of the reasons many northern European nations joined the Protestant Reformation and rejected the authority of the Pope in Rome. **Without a fair and equitable international agreement** that honored the interests of emerging states, **the Church lost its ability to act as an arbiter** between nations.

Even worse, **the dominance model set up centuries of conflict among** the **major powers in Europe. Militant nationalism and economic colonialism became the principles guiding national policy. The result was centuries of war**, suffering, and neglect among the major powers and the nations they subjugated. **This** pattern **did not end until the 20th century,** when the major powers fought two world wars and finally dismantled their colonial empires: sometimes peacefully, sometimes by force.

**By the mid-1960s, most countries** on Earth **were independent** or on their way to becoming so. **But a new conflict had started**, one **that threatened to repeat the mistakes of five centuries earlier.** The **great powers were once again using their advanced technology to explore new worlds**, and the race was on to plant their flag on the Moon first. Under the ancient traditions, the country that did so would have a claim against all others for possession and use of the territory. **The Cold War was about to expand into outer space.**

But **then something wonderful happened. In 1967, the U**nited **Nations proposed, and the world’s space powers accepted,** an international agreement known as **the O**uter **S**pace **T**reaty.[4] The treaty was **an intentional effort to avoid the mistakes of the Age of Exploration & Empire.** Article I states, “The exploration and use of outer space, including the moon and other celestial bodies, shall be carried out for the benefit and in the interests of all countries, irrespective of their degree of economic or scientific development, and shall be the province of all mankind.” Article II is even more specific: “Outer space, including the moon and other celestial bodies, is not subject to national appropriation by claim of sovereignty, by means of use or occupation, or by any other means.” Because of this treaty, the United States carried a plaque to the Moon that said, “We came in peace for all mankind.”[5] When the Apollo 11 astronauts planted the US flag, they did so out of pride, but did not establish any claim or national priority.

**This legal framework worked well initially, but** people soon started wondering about what to do when countries or private entities wanted to start commercial activity on the Moon, or build settlements. The solution was the Moon Treaty, proposed by the United Nations and adopted by enough nations to come into force in 1984.[6] But it has not yet been adopted by any major spacefaring nation. The United States, by a recent executive order, has specifically renounced the treaty and stated its intentions to extract materials from the Moon without any international agreement.[7]

**The newly announced Artemis Accords** go even further. Although the actual Accords have not been released pending consultation with possible partners, the summary provided by NASA[8] indicates that the United States will unilaterally interpret the Outer Space Treaty to allow “space resource extraction,” despite the prohibition against appropriation in Article II of the Treaty. There will also be “safety zones” to avoid “harmful interference” with such operations. The effect is to establish exclusive economic zones, especially if “harmful interference” is defined to include economic harm, not just safety. Will the new Space Force be used to protect such economic interests? Will other nations be excluded if they support the Moon Treaty?[9] Will private actors be required to follow the same rules as states, as recommended in the recently drafted Moon Village Principles?[10] This is the slippery slope of using unilateral action to establish economic rights rather than an international agreement.

The Artemis Accords acknowledge many beneficial agreements and policies: The Outer Space Treaty, Rescue Agreement, and Registration Convention (though not the Liability Convention); peace, transparency, interoperability, protecting heritage sites and sharing scientific information. **But its unilateral authorization** of space mining **is a continuation of the Trump Administration’s underlying foreign policy strategy: unilateral dominance over international cooperation. The U**nited **S**tates **has withdrawn from the Paris Accords, the Iran**ian nuclear **deal, and, in the middle of a pandemic, the W**orld **H**ealth **O**rganization. **Dominance has even become the theme** of the administration’s domestic policy, with President Trump recently telling governors, “If you don't dominate, you're wasting your time… You have to dominate.”[11] **That core philosophy is** now **being applied to outer space**, as Vice President Mike Pence proudly announced in 2018. **Despite the lessons of history, the U**nited **S**tates **is going full speed ahead with the “dominance” model of space development rather than** working with the nations of the world to develop a **“cooperation”** model. **Outer space, which** so far **has been preserved for peace and cooperation, is about to be spoiled, perhaps forever**.

**Goes nuclear – space conflict is uniquely escalatory.**

**Farley 22** – PhD, Senior Lecturer at the Patterson School at the University of Kentucky

Robert Farley, 1-9-2022, “Does A Space War Mean A Nuclear War?” 1945, https://www.19fortyfive.com/2022/01/does-a-space-war-mean-a-nuclear-war/ DD

The **recent Russian a**nti-**sat**ellite **test** didn’t tell the world anything new, but it **did reaffirm the peril posed by warfare in space**. Debris from explosions could make some earth orbits remarkably risky to use for both civilian and military purposes. But the test also highlighted a less visible danger; **attacks on nuclear c**ommand **and c**ontrol **satellites could rapidly produce an extremely dangerous escalatory situation** in a war **between nuclear powers.** James Acton and Thomas Macdonald drew attention to this problem in a recent article at Inside Defense. As **Acton and MacDonald point out, nuclear c**ommand **and c**ontrol **sat**ellite**s are the connective tissue of nuclear deterrence, assuring countries** that **they’re not being attacked and** that **they’ll be able to respond quickly if they are.**

For a long time, **these** strategic early-warning **satellites were** akin to **a center of gravity in ICBM warfare.** Nuclear **deterrence requires awareness that an attack is underway. Attacks on the monitoring system could** easily **be read as** an attempt to blind **an opponent in preparation for** general **war, and could** themselves **incur nuclear retaliation**. Thus, the nuclear command and control satellites are critical to the maintenance of nuclear deterrence. They make it possible to distribute an order from the chief of government to the nuclear delivery systems themselves. Consequently, their destruction might lead to hesitation or delay in performing a nuclear launch order.

It was only later that the relevance of satellites for conventional warfare became clear. Satellites could reconnoiter enemy positions and, more importantly, provide communications for friendly forces. Indeed, the **expansion of the role of sat**ellite**s in conventional warfare has complicated the prospect of space war**fare. **States have a clear reason for targeting enemy satellites which support conventional warfare**, as those satellites enable the most lethal part of the kill chain, the communications and recon networks that link targets with shooters. Thus, **we now have a situation in which space military assets have both nuclear and conventional roles**. In a conflict **confusion and misperception** could **rapidly become lethal. If one combatant views an attack against nuclear c**ommand **and c**ontrol **as a prelude to** a general **nuclear attack, it might** choose to **pre-empt.**

Nuclear powers have dealt with problems in this general category for a good long while; would a conventional attack against tactical nuclear staging areas represent an escalation, for example? Would the use of ballistic missiles that can carry either conventional or nuclear weapons trigger a nuclear response? Do attacks against air defense networks that have both strategic and tactical responsibilities run the risk of triggering a nuclear response?  **There’s also** the **danger that damage to communications networks designated for conventional combat** could **force traffic onto the nuclear** control **systems, further confus**ing **the issue.**

**No one has ever fought a nuclear war**, and no two nuclear powers have engaged in a prolonged, high-intensity conventional conflict. **Now that conventional systems have become implicated in space tech**nologies for reconnaissance, targeting, and communications, **leaders will have to make very difficult**, very careful **decisions** on what enemy capabilities they want to disrupt. Acton and MacDonald propose a straightforward ban on attacks against nuclear satellite infrastructure, which would also require agreement to keep nuclear and conventional communications networks separate. This is the little ask; countries should plan to fight more carefully. The big ask is for a multilateral ban to prevent future anti-satellite weapons tests in space. This would reduce the danger that debris could close off, temporarily or permanently, human access to certain locations in earth orbit. But given that countries use satellites for the conduct of conventional military operations, it’s a lot to ask for warfighters to consider critical military infrastructure off-limits in any particular conflict.

**1NC—Case**