The Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, colloquially known as the Outer Space Treaty, provides a sovereign-based construct as a framework for the regulation of space activities. Negotiated during the 1950s and 1960s in the magnificent shadow of the Cold War, the Outer Space Treaty was focused not on the creation of human communities in space, but on the preservation of peace in this boundless frontier whose resources and potential humanity was just beginning to explore.

As its name suggests, the treaty provides principles and not rules, but perhaps more significantly, the principles are offered to govern nations rather than people. While some see this gap as an opportunity to rid our future spacefaring progeny of the bounds of terrestrial legalities, this is not the case. Nestled among the concept of freedom of exploration and use, the prohibition of nuclear weapons and weapons of mass destruction, and multiple exhortations for international cooperation is the statement that countries shall be responsible for the activities of their nationals. The treaty even requires the authorization and continuing supervision of all such activities.
Thus, for six decades, sovereign nations and commercial entities alike have explored and harnessed space to benefit human existence through astonishing advancements in communications, Earth observation satellite technologies and resources, among many others.

But today we stand at a threshold. As we look beyond low Earth orbit, the notion of space resource utilization—the mining of our Moon, asteroids, and other celestial bodies—has moved from dream to prediction. In this regard, the Outer Space Treaty offers us another gap, as Article II of the treaty reads: “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.” Read in conjunction with its statement that the use of outer space “shall be the province of all mankind,” this has led some to argue that the benefits of any resource extraction activities must be shared by all people. Others argue that the language of Article II itself implicates only sovereign nations, and not private activity. Both of these arguments are shortsighted.

Even though our first miners may be robotic, humans are a curious, investigative, and migratory species and it is part of our natural instincts to reach for that next frontier, to head to that brighter horizon. To paraphrase the words that Sir Edmund Hillary made immortal, we will do it because it is there. It is inevitable that people will accompany or follow robots to the stars.

At some point, we must recognize that these communities will not, and cannot, be bound by the Outer Space Treaty to terrestrial sovereigns and their norms. National laws and regulations have evolved in response to uniquely terrestrial realities. While fundamental human rights must be preserved—as they travel with the individual—law must be given the opportunity to address the circumstances under which they do so.

As such, the question that faces us on the precipice of our multi-planetary future was best elucidated by Alexander Hamilton: whether societies are “really capable or not, of establishing good government from reflection and choice, or whether they are forever destined to depend, for their political constitutions, on accident and force.” It is time to make choices, and claiming that we do not need laws in space is to misunderstand the meaning of law. Yet the framework offered by the Outer Space Treaty focuses on sovereign bonds and responsibilities, so how do we tackle this new chapter of human expansion?

In its purest form, law is a social contract. As Jean-Jacque Rousseau wrote, it is “a form of association which shall defend and protect with the public force the person and property of each associate, and by means of which each, uniting with all, shall obey however only [themselves], and remain as free as before.” Likewise, as Rousseau explains, the purest form of the social contract is the family. Children start their lives dependent upon their parents. When this need ceases, the natural bond is dissolved and both the parents and the children become independent, yet they remain united voluntarily, “and the family is maintained only by agreement.”

In other words, law is organic. It is a natural tendency for people to enter into these contracts, and that tendency is built around the concept of property. Although an imperfect muse, in part because of the blinders imposed by 18th century society, Rousseau continues to be instructive. He recognized the right of the “first occupant upon any territory” under the following conditions: “first, that the land shall never have been occupied; second, that only such a quantity be occupied as will be necessary for subsistence; third, that it be taken possession of not by any empty ceremony but by labor and cultivation.” In turn, those with land occupied as such would unite in a social contract—it is the community that will assure legitimate possession.

The Outer Space Treaty is not at odds with Rousseau; rather, it reaffirms the concept that the exploration and use of space should be free and accessible to all. However, it makes no attempt to provide a governance structure or even a conceptual treatment of property. It is the duty of our generation to build upon the principles set forth by the Outer Space Treaty in 1967 and to construct a framework with the benefits of reflection and choice. We need law in space, because it is with law that we will achieve the equality that we all seek, and the Outer Space Treaty itself demands.

Above all else, this law must recognize that we are—or will be—individuals in space, not just nations or corporate entities. Law must offer participants incentive to agree; a social bargain, as opposed to a monocratic canon. It must evolve integrally, its structure must allow for revision, and it must accept that people in space communities have a right to property in some form, as that sense of possession is the basis upon which a contract, an enforceable law, may be achieved. Utilizing the resources of space, and ultimately living and working in space, will provide tangible rewards to the home planet of space pioneers. The law must assure that basic benefits accrue as well to those pioneers themselves.