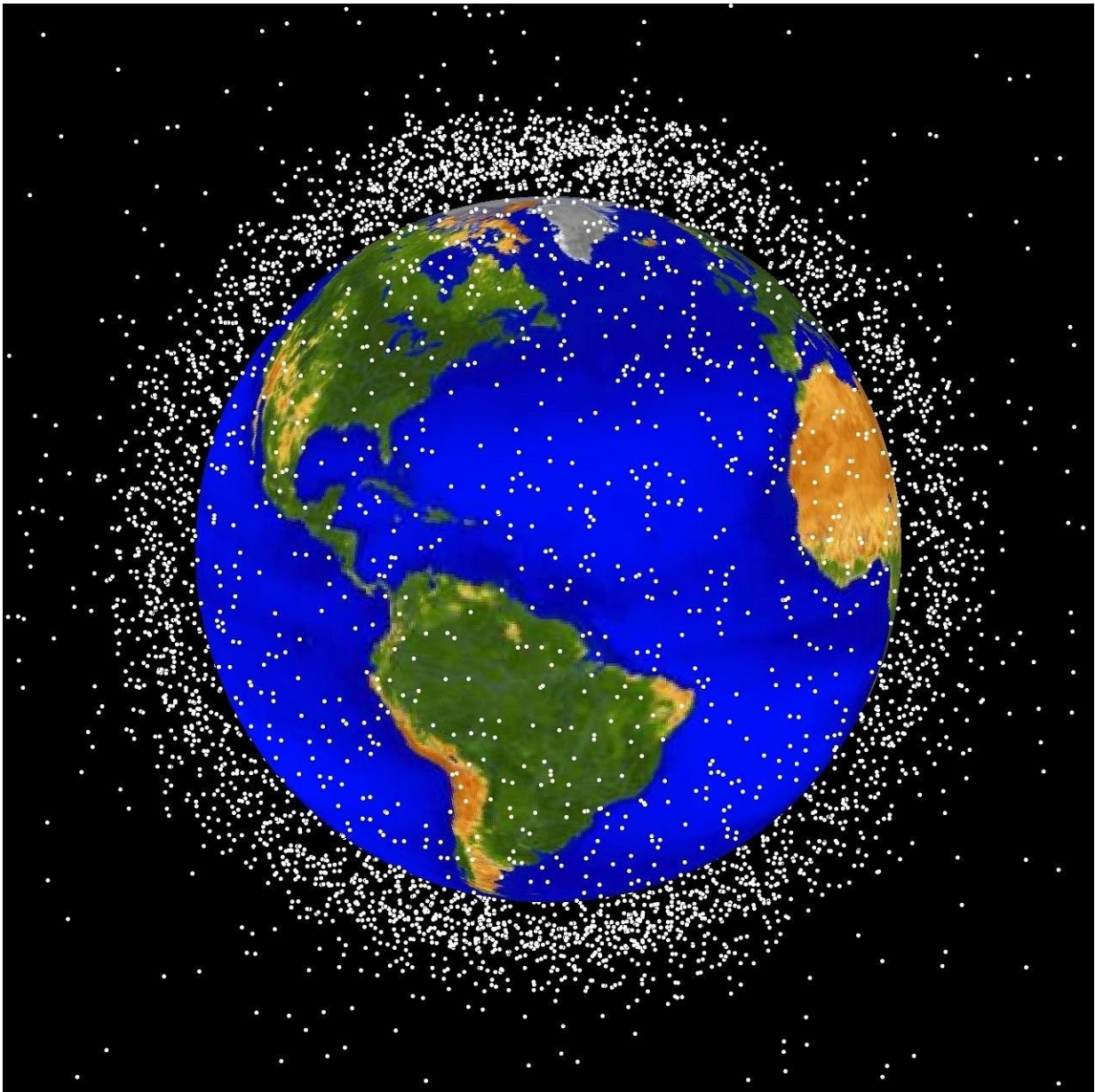


# France pledges not to conduct anti-satellite missile tests but leaves other options open

February 3 2023, by Thomas G. Chevalier

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Driven by concerns over space debris, in late November the French Ministry for the Armed Forces formally committed [not to conduct anti-satellite missile tests](#). And yet, France's [space strategy of 2019](#) resolved to "toughen" the country's space capabilities.

Given the short lapse of just three years, how can we make sense of France's seemingly contradictory space military policy?

## **A historic but surprising decision?**

In [October 2022](#), the United Nations [voted](#) to work towards putting an end to "destructive direct-ascent antisatellite missile testing"—that is, missiles fired at satellites from Earth's surface or from the air. France cosponsored the resolution and voted for it, despite possessing the technical expertise required to [develop such a capacity](#).

The [ministry's statement](#), published on 9 November 2022, is strongly worded. It dubs anti-satellite testing as "destabilizing and irresponsible," and insists France never conducted such tests. It also voices concerns about the potential impact of [space debris](#) on the integrity of in-use satellites, as well as for the space domain. France's decision follows that of the United States on [9 April 2022](#), which the Elysée Palace [had then applauded](#).

The French Ministry's determination is especially historic given that France is one of the few countries to have developed a '[strategic triad](#)' consisting of intercontinental missiles, [nuclear weapons](#), and aerospace capabilities.

## France's space and ballistic program

The country's ballistic program is ongoing and involves the [renewal of nuclear deterrence](#), the modernization of Ariane Group's sea-land [ballistic missile M51](#), and the development of the fourth-generation [air-land nuclear missile \(ASN4G\) and the hypersonic glider V-Max](#).

Although this modernization effort does not directly relate to anti-satellite testing, it goes to show the extent to which France has invested in ballistic capabilities.

In parallel, the Syracuse program is intended to provide the country's [armed forces](#) with [new-generation military satellites](#), powering high-speed communications from the earth, sky, oceans, and underwater. These satellites are equipped with surveillance systems capable of observing their immediate environment, as well as changing trajectory in the event of an attack. Alongside the CSO and CERES satellites, they represent the French Defense's eyes, ears, and voice *in* and *from* space. The "Céleste" electromagnetic intelligence (ELINT) and the "Iris" optical observation programs—whose launch was postponed due to the [COVID-19 pandemic, Ariane 6 delays, and Russia's invasion of Ukraine](#)—will follow.

Finally, [in November, Emmanuel Macron](#) established outer space as a strategic priority in the wake of ongoing discussions to design the next [pluriannual military planning law](#) (*Loi de Programmation Militaire*), for 2024–2030.

## A traditional show of force

Given France's advances in the domain of satellite and missile capabilities, one could have envisaged that the country would at some point develop an anti-satellite missile—for example, a high-altitude

version of the [Aster 30](#) antiballistic missile. The French Armed Forces could have conducted a live-fire test against a non-functional French satellite—and in an orbit minimizing the impact of space debris—for "demonstration" purposes.

Anti-satellite tests have represented significant markers of military power throughout space history. The [Secure World Foundation](#) identifies more than [70 since 1959](#), 20 of which occurred after 2005. The most emblematic include the Chinese test in [January 2007](#), the American response in [February 2008](#), India's test in [March 2019](#), and Russia's in [November 2021](#). In October 2022, NASA was still forced to maneuver International Space Station out of harm's way to avoid collision with debris created by Russia's test, according to the [space agency](#).

It is also worth noting the US's steps to prevent the so-called "[weaponization](#)" of space contrast with previous governments' policies, including the renewal of [US space nationalism](#) after the Cold War and the creation of the [US Space Force](#) in 2020 under Donald Trump.

Although the past decades have seen efforts to define [codes of conduct in space](#)—with the [active participation of France](#) –, these are not self-evident and should not be taken for granted. Indeed, oscillations between [militaristic visions and "strategic self-restraint"](#) have long characterized space history. And the "[new Space Age](#)" remains subject to military matters, notwithstanding its increasing integration of [private actors](#) and [commercial opportunities](#).

## 'Strengthening' France's space doctrine

The question of space has become increasingly critical for France. Emmanuel Macron's first term and Florence Parly's term as minister for the Armed Forces have jointly led to a [significant leap in the domain of space defense](#).

In September 2019, the creation of the [French Space Command](#) and the elaboration of a [space defense doctrine](#) marked a turning point. Continuing the theme, in September 2020 the French Air Force was renamed "[French Air and Space Force.](#)" At the time, several members of Parliament called on the state to adopt a combination of "[offensive](#)" and "[defensive](#)" means, referring to a long-lasting dichotomy that still [characterizes space activities](#).

While France's space doctrine is careful to respect international law, its primary goals are to support military operations and to "discourage adversaries from harming [French space assets]." The doctrine thus considers space as a 'force multiplier' alongside other domains and highlights the importance of [space surveillance](#).

## **How to protect French satellites?**

But protecting space assets requires two elements: technical capacity and a sense of how to go about deploying it.

First, from a technical standpoint, like the United States, Russia, or China, France is currently developing weapons capable of 'blinding' or 'burning' the critical systems of hostile satellites. In [June 2019](#), the head of the French national aerospace research center (*Office National d'Études et de Recherches Aérospatiales*, ONERA) told the magazine *Challenges* his scientists were currently developing anti-satellite lasers. In a [note from May 2019](#), they specified they had already deployed full-scale tests against deactivated satellites.

Such tests hardly differ from anti-satellite missile testing, except for the quantity of debris they generate. Lasers are part of a range of space capacities that also comprises [cyber-attacks](#) and signal jamming against satellites, [satellite killers](#), and [space drones](#).

Second, from a doctrinal standpoint, France's [2019 space strategy](#) leans toward a form of "strategic ambiguity," a [notion reactivated with the war in Ukraine](#). Paradoxically, the country's renouncement to anti-satellite testing reinforces this ambiguity. The document indeed specifies France "reserves the right" to take "retaliatory" actions against an "unfriendly act in space," and to exercise its "right to self-defense" in the event of an "armed aggression in space."

The words allow flexibility in interpretation and maintain a form of ambiguity as to what France will consider as a possible aggression and how it will react. This ambiguity is a tenet of the 'strategic vocabulary' that guarantees the efficacy of ["space deterrence."](#) It also allows the state to respond to an aggression even if it does not pass the threshold of armed conflict.

In this regard, the strategy appears to seek a ["psycho-technological equilibrium"](#) typical of Raymond Aron's realism. Willingness and determination—and how they are subjectively perceived—are as important as a country's technological credibility and its [technical capacity to strike](#).

In publicly renouncing to anti-satellite missile testing, France keeps other options open without clearly laying them out. As it stands, a [convergence](#) with the [French cyber doctrine](#) is plausible, especially to [prevent cyber attacks on satellites](#). Created in 2017, the [Cyberdefence Command](#) displays a more resolute [offensive posture](#)—something France's space doctrine could be aiming for as well.

On January 2023, Emmanuel Macron announced that France's military spending will [increase by a third until 2030](#). Meanwhile, the French Air and Space Force will be looking at [options to operate in "higher airspace,"](#) that is, the region above where aircrafts can operate in but below the altitudes of low-orbiting satellites. France's air and [space](#)

doctrine is thus likely to evolve once again in the foreseeable future.

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Provided by The Conversation

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