

China: what lies behind the controversy over the ‘phantom’ nuclear test?

Solène Vizière, member of the Board, Initiatives for Nuclear Disarmament (IDN)

On 6 February 2026, in Geneva, US diplomats brought the issue of nuclear testing back into the spotlight, [accusing](#) China of having conducted a clandestine low-yield test on 22 June 2020 at the Lop Nur site in Xinjiang. A few days later, a senior US official elaborated on these accusations: a seismic event of magnitude 2.75 detected by a station in Kazakhstan, some 720 km from Lop Nur, was allegedly in fact a “yield-producing” underground nuclear explosion. Beijing categorically denies the allegations, whilst the Comprehensive Nuclear-Test-Ban Treaty Organisation (CTBTO) stresses that its data does not support the hypothesis of a test.

Behind this standoff lies not merely a new diplomatic row, but a global issue: the questioning of the test ban, China’s entrenchment in a new arms race and, implicitly, the urgent need to put multilateral nuclear disarmament back at the heart of the agenda.

The ‘22 June 2020 event’: an analysis of US suspicions

In Geneva, the US Under-Secretary of State for Arms Control, Thomas DiNanno, stated that Washington was “aware that China has conducted nuclear tests”, including preparations for tests with a yield of “several hundred tonnes” of TNT equivalent. He explicitly mentioned the date of 22 June 2020 and the Lop Nur site, the heart of China’s testing programme since the 1960s.

A few days later, Christopher Yeaw, Assistant Secretary of State for Arms Control, [provided](#) further details at an event at the Hudson Institute, a conservative think tank in Washington. He explained that a Kazakh seismic station had recorded a low-magnitude “earthquake” on that day, but that its epicentre was believed to be in the immediate vicinity of the Lop Nur test site. According to him, this was not a

natural earthquake but an underground explosion, and more specifically a “yield test”, i.e. one that triggered a genuine chain reaction in a nuclear device, even one of very low yield.

Washington also accuses Beijing of having resorted to a classic concealment technique: “decoupling”. The principle involves detonating the device in a large underground cavity, which greatly attenuates the seismic signal and makes it harder to distinguish from natural background noise. This method, already studied during the Cold War to circumvent a potential ban on testing, is [presented](#) here as the key to the partial ‘invisibility’ of the June 2020 event.

These claims come at a highly political juncture. Three days earlier, on 5 February 2026, the New START treaty—the last agreement limiting US and Russian strategic arsenals—expired. Against this backdrop of a legal vacuum, the denunciation of a clandestine Chinese test also serves to [justify](#) the US call for a new negotiating framework including China, which is portrayed as a power “*without limits, without transparency, without declaration, without control*”.

The caution of scientists and the position of the CTBTO

Faced with this very confident narrative, independent experts are proving far more cautious. Speaking to NPR, Ben Dando, a Norwegian expert at the CTBTO, [emphasises](#) that with the publicly available data, “*we can neither confirm nor refute*” the theory of a nuclear test and that there is currently no “conclusive evidence”. Open seismological analyses do indeed show a minor event in 2020, but its signature does not allow for a clear distinction between a small explosion and a natural phenomenon.

The authoritative organisation in this field, the CTBTO, takes an even clearer stance. In a [statement](#) dated 17 February 2026, its Executive Secretary Robert Floyd noted that its International Monitoring System recorded only two seismic micro-events in 2020, both “well below” its detection threshold for a nuclear test ([on average](#) a magnitude of 4 or an explosion of approximately 1 kt). None of these signals exhibited the characteristics expected of an atomic explosion, even a very weak one, and further analysis has not altered this conclusion.

In other words, the global network designed specifically to enforce the test ban detected nothing resembling a Chinese nuclear test in June 2020. The signals do exist, but their magnitude and signature are not sufficient to validate the US allegations. The CTBTO, keen to preserve its technical credibility, emphasises the difference between frequent seismic ‘anomalies’ and a nuclear test, the signature of which must be established with a high degree of certainty.

From a disarmament perspective, this caution is crucial. If we start labelling every weak and poorly understood seismic event a ‘nuclear test’, we undermine the already fragile status of the test ban, which is nevertheless an indispensable pillar of a world without nuclear weapons. For the record, the [Comprehensive Nuclear-Test-Ban Treaty](#) (CTBT), adopted in 1996, has still not formally entered into force due to the failure of nine countries (including the United States and China) to ratify it, but its verification system is operational.

China’s response: denial, suspicion and counter-accusations

Unsurprisingly, Beijing categorically rejects the accusations. The spokesperson for the Chinese Ministry of Foreign Affairs, Lin Jian, [describes](#) the allegation of a clandestine test as “completely unfounded” and equates it with an attempt by Washington to fabricate a pretext for resuming its own tests, a move actually [envisaged](#) by President Trump in October 2025. China maintains that it has respected its unilateral moratorium on nuclear testing since 1996 and points out that it has signed, although not yet ratified, the CTBT (which implies, under [Article 18 of the Vienna Convention](#) on the Law of Treaties, that it refrains from conducting tests since these would deprive the treaty “of its object and purpose”).

On the diplomatic front, China’s ambassador to the Conference on Disarmament, Li Song, [denounces](#) yet another “exaggeration of the Chinese nuclear threat” by the United States. According to him, Washington is seeking to “divert attention from its own responsibility regarding disarmament”, whilst the US Congress debates colossal investments in the modernisation of the nuclear triad and President Trump has ordered the Pentagon to prepare to resume atmospheric or underground testing.

This rhetorical reversal is not merely a superficial argument. It forms part of a broader Chinese strategy: to highlight the difference in scale between its

arsenal—[estimated](#) at around 620 nuclear warheads by early 2026—and those of the United States or Russia, each of which possesses more than 5,000 warheads. Beijing thus presents itself as a ‘moderate’ player in comparison to the two historic superpowers and asserts that it is primarily the latter who must drastically reduce their stockpiles before demanding further commitments from China. This stance nonetheless stands in tension with the reality of an accelerated modernisation programme.

Towards the end of the taboo on US testing?

One of the most worrying aspects of this development is its place within recent US nuclear policy. On 29 October 2025, Donald Trump ordered the Pentagon to prepare to resume nuclear testing ‘on an equal footing’ with other powers, explicitly citing China and Russia as justification.

This decision breaks with [three decades of the US moratorium](#) on testing and calls into question the political—if not legal—norm that had gradually become established since the 1990s: none of the five states recognized nuclear-weapons states under the NPT had conducted an explosive test since the late 1990s. The prospect of the United States breaking this taboo would deal a blow not only to the CTBT, already weakened by its failure to enter into force, but to nuclear disarmament efforts as a whole.

In this context, the accusation of a clandestine Chinese test plays a particular role. Beijing claims that it provides precisely the political pretext sought by Washington to justify resuming its own tests. While this interpretation is self-serving on the Chinese side, it nevertheless highlights a reality: in an atmosphere of widespread mistrust and strategic competition, every allegation of a test can be used to legitimise the adversary’s nuclear modernisation or remilitarisation.

For advocates of disarmament, this illustrates a well-recognised dynamic: as long as arsenals exist and their legitimacy is not challenged in normative terms, the slightest suspicion becomes an argument for building new weapons, rather than an incentive to reduce risks.

Lop Nur, a discreet laboratory for low-key modernisation

The controversy of 2026 did not arise out of nowhere. For several years, experts from think tanks and research institutes have been observing, via satellite imagery, increasing activity at the Lop Nur site, which has officially been dormant since China's last test on 29 July 1996.

Chinese political scientist Tong Zhao, affiliated with the Carnegie Endowment for International Peace, [points out](#) that the construction of new tunnels and technical buildings, as well as improvements to logistical infrastructure, are “consistent with the site's highly active status”. He notes, however, that modernisation work, ‘subcritical’ tests or hydrodynamic experiments may explain these developments without involving explosive tests in the traditional sense.

[Historical studies](#) show that Lop Nur was the site of 45 tests between 1964 and 1996, including 23 atmospheric tests (up to 1980) and 22 underground tests (representing barely 2% of the [total number](#) of tests carried out by all nuclear powers, 2,056, of which 1,030 were conducted by the United States), but that the surrounding region, extending as far as southern Kazakhstan, suffered significant radioactive fallout. An [analytical review](#) published in late 2024 on radioactive contamination in the south-east of Abai Oblast concludes that several Kazakh villages were indeed affected by fallout from Lop Nur, with levels of caesium and strontium higher than those in unexposed areas.

This record of historical tests serves as a reminder of the human and environmental cost of Cold War testing campaigns, whether conducted by China, the United States, the USSR or France. From this perspective, what matters is not merely whether Beijing conducted a test in 2020, but rather to emphasise that any return to nuclear explosions runs counter to the [international standards](#) established to prevent further health disasters.

A world without safeguards: after New START, the temptation to outdo one another

This debate over an alleged Chinese test comes at a time when the arms control framework is more fragile than ever. With the [expiry of New START](#), there is no longer any legally binding treaty limiting the strategic arsenals of Washington and Moscow. The UN Security Council has failed to agree on a replacement initiative, and the trilateral negotiations involving China have stalled.

Yet, in a world without limits, every incident, every suspicion – an unusual earthquake, a missile launch, unusual activity at a site – can become a pretext for strengthening deterrence rather than controlling it, or even for resorting to nuclear weapons. This is precisely the scenario feared by advocates of disarmament. In a [series of articles](#) published in 2025, a group of experts in public health, international law and strategic security warns: “*If we do not stop nuclear weapons, they will eventually stop us*”, emphasising that technological progress and the proliferation of actors automatically increase the risk of deliberate or accidental use.

In this context, the focus on a possible Chinese test, whether real or alleged, cannot be separated from a broader assessment: all nuclear powers, starting with the United States, Russia, and China, are investing heavily in the modernisation of their arsenals and in dual-capability systems, whilst allowing control mechanisms to crumble. However, the data accumulated over decades from their numerous nuclear tests and the shift to simulation since the end of explosive testing enable them to undertake this modernisation without the need for further explosions.

From the false debate over ‘phantom tests’ to the real urgency: disarmament

Faced with mutual accusations and technical grey areas, a typical reaction is to call for greater surveillance, more sensitive detection systems, and tougher sanctions against states suspected of conducting tests. Whilst these measures have their place, they remain confined to a mindset of managing symptoms rather than causes.

From the perspective of IDN and a broad section of international civil society, the real answer can only take the form of strengthening multilateral disarmament, not a new arms race justified by the proliferation of ‘documented cases’. This involves several complementary strands.

Firstly, **the universal ratification of the CTBT**, starting with that of China, the United States and Russia (which [withdrew](#) its ratification in 2023), whose abstention

prevents the treaty from entering into force despite a verification system that is already operational. Until these powers make a legal commitment to renounce testing, every allegation will remain an instrument of political pressure rather than a legal issue. It will also be necessary to convince the other states whose signature and/or ratification is required (North Korea, Egypt, Iran, India, Israel, Pakistan).

Next, the **gradual reduction of existing arsenals**, in accordance with Article VI of the NPT, **rather than their qualitative modernisation**. SIPRI analyses show that, for the first time since the Cold War, the number of nuclear warheads actually deployed worldwide is on the rise again, notably due to China's growing military power and Russian and American modernisation.

Finally, **recognition of the Treaty on the Prohibition of Nuclear Weapons (TPNW) and its rationale**: this is not a 'symbolic gesture' but a legal instrument that reflects the growing stigmatisation of nuclear weapons under international humanitarian law. By focusing on the humanitarian and climate consequences of a nuclear explosion – even one described as 'low-yield' – the TPNW complements the CTBT and offers a counter-narrative to the normalisation of these weapons as routine instruments of security.

Seen in this light, the debate over China's 'phantom test' takes on a different meaning. Whether or not there was a clandestine test at Lop Nur in 2020, the very fact that states are now trading accusations of secret testing shows that the ban on testing remains fragile, reversible, and constantly under threat from short-term national interests. As long as arsenals exist, the temptation to refine them, test them and use them as a diplomatic lever will persist.

This is precisely what IDN is highlighting when we speak of the "*urgent need for a world without nuclear weapons*": not a naïve utopia, but the only way to break free from a cycle in which every rumour of a test, every ambiguous seismic reading, becomes a pretext for a new cycle of fear, escalation and military spending, to the detriment of human security and the long-term survival of societies.