

Iran's Nuclear Program: Between IAEA Warnings and Moves Toward a Deal

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The International Atomic Energy Agency (IAEA) published two alarming reports regarding Iran's nuclear program. One report addresses Iran's past activities at sites not declared to the IAEA, for which Tehran has failed to provide satisfactory explanations. The second report concerns the current status of the program and indicates an acceleration in the accumulation of highly enriched uranium, enabling Iran to enrich to military grade for 10 nuclear bombs within days. Both reports are expected to be discussed at the upcoming IAEA Board of Governors meeting, scheduled for June 9. It appears that the United States and the Europeans will submit a draft resolution stating that Iran is violating its NPT commitments. This resolution could form the basis for referring the matter to the UN Security Council and triggering the snapback mechanism, which permits the Security Council, under the 2015 nuclear agreement (JCPOA), to reinstate sanctions on Iran before the snapback clause expires in October 2025. These developments complicate the nuclear talks taking place between Washington and Tehran. However, all parties share a common interest in avoiding military confrontation. The task will be to find a solution that allows the US administration to present achievements beyond those of the nuclear agreement from which President Trump withdrew, and for the Iranians to preserve, in some manner, their red line—the right to enrich uranium on Iranian soil.

The International Atomic Energy Agency (IAEA) published two reports on May 31 concerning Iran's nuclear program. One report—routine, issued every three months—summarizes the state of the program and reveals that Iran has increased the rate of uranium enrichment to a high level of 60%, and that its current stockpile is 408.6 kg. According to IAEA metrics, this quantity of uranium—if further enriched to weapons grade—would be sufficient to produce about 10 nuclear bombs. Professional assessments estimate that it would take Iran less than two weeks to convert this quantity into fissile material enriched to 90%—the level required for a nuclear weapon—and several additional months (less than a year) to produce a nuclear device. In this context, the IAEA director general reiterates that the significant increase in the production and accumulation of highly enriched uranium by Iran—the only non-nuclear state producing such material—is a source of “serious concern,” since such an enrichment level has no civilian justification.

The second report, which the IAEA was requested to prepare, summarizes Iran's lack of cooperation and transparency regarding investigations conducted by the IAEA for about six years into undeclared materials found at sites not disclosed by Tehran. According to its obligations under the Nuclear Non-Proliferation Treaty (NPT), Iran is required to report on its nuclear materials and activities. In practice, according to the report, it did the opposite—

concealed work at undeclared sites and obstructed in-depth investigations when these were exposed. This conclusion also contradicts a recent explicit statement by Iranian Foreign Minister Abbas Araghchi, who claimed that Iran is meeting all its obligations under the NPT and has no desire to produce nuclear weapons. For its part, the IAEA reiterates that it has not received an explanation for all of Iran's past nuclear activities and cannot conclude that Iran's attempts to conduct secret nuclear operations have ceased.

The main significance of the report dealing with past activities lies in holding up a mirror to both Iran and the international community regarding Iran's ongoing concealment and reinforces the possibility that undeclared parts of the nuclear program may still be active to this day. In addition, the renewed reporting notes that Iran previously (2003–2004) conducted four full tests of a hemispherical implosion system that were recorded by at least one high-speed camera. These experiments enhanced Iran's confidence that the explosive mechanism would function properly.

The two reports are expected to be discussed at the upcoming IAEA Board of Governors meeting on June 9. The United Kingdom, Germany, and France (the E3), signatories to the original 2015 nuclear deal (JCPOA), along with the United States, are conducting consultations in advance regarding a resolution they will present, with an emphasis on the possibility of declaring that Iran is violating its commitments under the NPT. The last time the Board of Governors adopted such a resolution was in September 2005. In a separate resolution several months later (February 2006), Iran's non-compliance was referred to the UN Security Council—a move that initiated the process of imposing sanctions on Iran.

In a rare joint response by Iran's foreign minister and the head of the Atomic Energy Organization of Iran (AEOI), both rejected the conclusions of the report concerning non-compliance and warned they would take "proportional steps" against any negative use of the report. Additionally, in an unusual personal response targeting the IAEA director general, the head of Iran's nuclear organization accused him of politicizing the reports to advance his own ambitions of becoming the next UN secretary general. In another exceptional and threatening move, former head of the AEOI, Fereydoon Abbasi, stated in an interview with Iranian media: "We have the capability to produce a nuclear weapon, but have not yet received such an order. If I am ordered to make a bomb, I will do it." These responses reflect the fear that the two reports will serve as justification for referring the Iranian nuclear issue to the UN Security Council, and as an additional pretext for the European JCPOA signatories, the E3, to trigger the snapback clause. Under the 2015 agreement, this clause allows for the reimposition of UN Security Council sanctions on Iran before it formally expires in October 2025.

The IAEA reports were published following five rounds of talks between the United States and Iran, which have not yet produced agreements, but during which the US administration presented the Iranians with a proposed deal. According to media reports, this proposal involves several phases. The core of the plan is to allow Iran, in the first stage, to continue enriching uranium at low levels on its own soil under supervision, as part of a temporary arrangement. In return, the United States would ease sanctions and allow the release of frozen funds. In the second stage, following the establishment of a regional uranium

enrichment consortium that includes Iran, the United States, and Arab states (particularly Saudi Arabia and the United Arab Emirates), Iran would gain access to enriched material but would be required to halt its own enrichment. According to the US proposal, the United States and other countries would assist Iran in establishing civilian nuclear reactors on its territory under full supervision.

The US proposal represents an attempt to bridge the gap between the Iranian stance asserting its right to enrich uranium and the American demand that it stop enrichment. Still, numerous questions remain regarding various aspects of the proposal, including the timeline for its implementation, which could take many years. Iran's Supreme Leader, Ali Khamenei, publicly rejected the US proposal, although Iranian negotiators have stated that they are still formulating a response. Despite Khamenei's opposition, it is estimated that his response does not necessarily close the door to continued negotiations, and it is likely that the Iranians will avoid "breaking the rules"—although they are expected to continue emphasizing their principled position of maintaining independent low-level uranium enrichment in Iran. The critical importance Iran assigns to the current negotiations is also reflected in the Supreme Leader's decision to establish a special team to formulate nuclear policy, which, along with the Majlis Committee on National Security and Foreign Policy, participates in the negotiation team's consultations prior to each round of talks with the United States.

The fundamental interest of both sides remains the formulation and approval of an agreement to prevent possible escalation into military action. The Iranians are willing to take significant steps to scale back the nuclear program, including giving up all medium- and high-enriched uranium. However, they are expected to reject a demand for a complete halt to enrichment, as they have stated since the start of the talks.

The timeline for positive progress is extremely short—between the decision by the Board of Governors, which, even if it does not yet refer the file to the UN Security Council, will lay the groundwork for such a move in the near future, and the negotiations with Washington, which are approaching the central point of contention: Without meaningful concessions from one side, progress is unlikely. This is all against the backdrop of October—the final date for the Security Council to reinstate sanctions using the snapback clause. In light of this tension, various parties are trying to introduce bridging proposals.

Meanwhile, the head of the AEOI announced that Iran is building its first nuclear power plant entirely based on independent capabilities, using local fuel and engineering, calling it a symbol of national pride and industrial strength. This announcement reflects Iran's internalization of the clear claim that it has no civilian justification for such an extensive uranium enrichment program, even at low levels. Iran's stated explanation is its intention to eventually reach 20 nuclear power reactors, for which it will need nuclear fuel. Currently, Iran's only power reactor was built by Russia, which also supplies its fuel for the reactor's entire lifetime. There is significant doubt that Iran can independently build a nuclear power reactor. Even if it does so with external assistance, it would take many years, and therefore such a broad and deep enrichment program lacks economic justification.

After many years of confrontation, compromises, and agreements between Iran and the international community over its nuclear program, and after Iran reached the status of a nuclear threshold state—with only a political decision separating it from becoming an actual nuclear-armed state—the moment of truth appears to have arrived. On one hand, according to IAEA reports, Iran is producing enough enriched uranium to build one nuclear device per month; on the other hand, President Trump reiterates that he will not allow Iran to possess nuclear weapons. In the background looms the possibility, now voiced more clearly than ever before, of a military strike by Israel or in coordination with the United States.

The regime in Tehran perceives the nuclear program as an important insurance policy and deterrent against attacks and existential threats. Even the willingness for compromises and concessions was meant to ensure the regime's stability and survival. Conversely, for the first time, the nuclear program might become a major risk to the regime, due to the concern that President Trump's intentions to increase pressure on Iran—including via military leverage—are seen as more credible than threats made by past American presidents. Much depends on Washington's determination to stick to its demand for the cessation of uranium enrichment in Iran or, alternatively, on its willingness to soften this demand by offering proposals that recognize the legitimacy of enrichment on Iranian soil.

In the ongoing negotiations between the parties—Iran, the United States, and the IAEA—a temporary compromise may be found, ranging from deferring a severe resolution in the Board of Governors in exchange for an Iranian commitment not to escalate its nuclear program, to exploring compromise proposals in another round of talks between Tehran and Washington. The common denominator among all the negotiating parties, with European and Gulf states in the background, is the desire to avoid military confrontation and to find a solution that would allow the US administration to demonstrate achievements beyond those in the nuclear agreement from which Trump withdrew, and for the Iranians to preserve, in some way, their red line—the right to enrich uranium on Iranian soil.

Editors of the series: Anat Kurtz, Eldad Shavit and Ela Greenberg