

November 2023

## EXPANDING THE U.S. NUCLEAR ARSENAL IS UNNECESSARY, AND WOULD INCREASE THE DANGER OF NUCLEAR WAR

A Response to the Report of the Congressional Commission on the U.S. Strategic Posture<sup>1</sup>

On October 12, 2023, the Congressional Commission reviewing America's strategic posture issued its report.<sup>2</sup> Nine of the twelve members of the Commission have direct financial ties to defense contractors or are employed at think tanks funded in part by weapons manufacturers.<sup>3</sup> The Commission calls for reinforcing and building up U.S. nuclear forces based on the alarmist view that the U.S. could face *simultaneous* attacks by two peer nuclear adversaries, Russia and China. According to the Commission, it can no longer be assumed "that nuclear forces necessary to deter or counter the Russian nuclear threat will be sufficient to deter or counter the Chinese nuclear threat simultaneously. Nuclear force sizing and composition must account for the possibility of combined aggression from Russia and China."<sup>4</sup>

The Commission accordingly offers a number of recommendations for enhancing the U.S. nuclear arsenal. These include expanding and accelerating the current

<sup>3</sup> "U.S. Nuke Panel Packed with Weapons Industry Interests," *The Guardian,* November 10, 2023 <sup>4</sup> Report of the Congressional Commission, p. 96

<sup>&</sup>lt;sup>1</sup> Principal author: Guy Quinlan, LCNP President

<sup>&</sup>lt;sup>2</sup> America's Strategic Posture: Final Report of the Congressional Commission on the Strategic Posture of the United States

modernization process, developing the capacity to produce additional nuclear warheads, developing "theater-range" nuclear weapons to provide increased "flexibility," increasing the planned number of B-21 stealth bombers, Ohio-class nuclear ballistic missile submarines and long range standoff stealth nuclear cruise missiles, preparing to place multiple warheads on land-based ICBMs, and considering the development of road-mobile land-based missiles.<sup>5</sup> The Commission also recommends development and fielding of air and missile defense capabilities that can defeat Russian and Chinese attacks.<sup>6</sup>

The proposed arsenal buildup would violate treaty obligations and would undermine the Nuclear Nonproliferation Treaty. The Nuclear Nonproliferation Treaty (NPT) is already under severe strain from multiple sources. In the Final documents of the 2000 and 2010 NPT Review Conferences, in response to frustration of the non-nuclear weapon states at the lack of progress on disarmament, the nuclear weapon states committed themselves "to reduce the role for nuclear weapons in security policies to minimize the risk that these weapons will ever be used" and to engage in processes leading to the "total elimination" of their arsenals.<sup>7</sup> Those commitments would clearly be violated by the proposed arsenal buildup. Indeed, contrary to the commitment to reduce the role of nuclear weapons, the Commission's report expressly says that absent sufficient conventional forces, "U.S. strategy would need to be altered to increase reliance on nuclear weapons to deter or counter opportunistic or collaborative aggression."<sup>8</sup> As noted by Adam Mount of the Federation of American Scientists, the proposed buildup "would reverse decades of initiatives from presidents of both parties to reduce reliance on nuclear weapons in favor of non-nuclear options which they considered more flexible."9 To repudiate key NPT commitments now would deal the treaty, and the entire nonproliferation regime, a severe and possibly fatal blow.

**These actions are unnecessary.** The existing U.S. arsenal, with about 1,800 deliverable strategic warheads and hundreds of additional warheads in reserve,<sup>10</sup> is sufficient to deter both Russia and China,<sup>11</sup> and as the Secretary of Defense has rightly said, security "is not just a numbers game," and "that type of thinking can trigger a dangerous arms race."<sup>12</sup> The U.S. "does not need to outnumber the

<sup>&</sup>lt;sup>5</sup> "Strategic Posture Commission Report Calls for Broad Nuclear Buildup," Hans Kristensen, Matt Korda, and Eliana Johns, Federation of American Scientists, October 12, 2023

<sup>&</sup>lt;sup>6</sup> Report of the Congressional Commission, p. 72

<sup>&</sup>lt;sup>7</sup> Final Document 2000 NPT Review Conference, NPT/Conf. 2000, Vol.1, p. 15; Final Document 2010 NPT Review Conference, NPT/Conf. 2010, Vol.1, pp. 20-21

<sup>&</sup>lt;sup>8</sup> Report of the Congressional Commission, p. 96 (emphasis supplied)

<sup>&</sup>lt;sup>9</sup> Adam Mount, "A Not-So-Strategic Posture Commission," *Arms Control Today*, November/December 2023, pp. 23, 25

<sup>&</sup>lt;sup>10</sup> Daryl G. Kimball, "Why We Must Reject Calls for a U.S. Nuclear Buildup," *Arms Control Today*, November 2023

<sup>&</sup>lt;sup>11</sup> Charles Glaser, James Acton and Steve Fetter, "The U.S. Nuclear Arsenal Can Deter Both China and China," *Foreign Affairs*, October 5, 2023

<sup>&</sup>lt;sup>12</sup> Remarks by Secretary of Defense Lloyd J. Austin III at the U.S. Strategic Command Change of Command Ceremony, December 9, 2022

combined total of our competitors to effectively deter them," as National Security Advisor Jake Sullivan observed.<sup>13</sup>

**The proposed actions would certainly trigger a new nuclear arms race.** It is completely unrealistic to assume that Russia and China would not respond in kind to the proposed increases, and the history of past arms races shows clearly that "the inevitable action-reaction dynamic would drive the cost of nuclear weapons up and up."<sup>14</sup>

The result would be even more dangerous than nuclear arms races in the past. Several times already the world has come within minutes of accidental nuclear war by human or machine error.<sup>15</sup> In 2015 a commission of retired military experts, chaired by a former Vice Chairman of the U.S. Joint Chiefs of Staff, found that the danger of nuclear war by accident or miscalculation was increasing because developing technology was shortening warning and decision times.<sup>16</sup> In the subsequent eight years that trend has continued and accelerated.<sup>17</sup>

**The new arms race would also be ruinously expensive.** The cost of the present modernization has been estimated at up to one and one-half trillion dollars over 30 years,<sup>18</sup> but that figure would be inflated enormously under the proposed buildup as superpowers compete for superiority in Artificial Intelligence, cyber security and offense, hypersonics, remote sensing, big data analysis, quantum computing and other emerging disruptive technologies.

Among other things, it would consume assets which are critically needed to avert climate catastrophe. Climate change will confront the U.S., as well as other nuclear weapon states and other advanced industrial nations, with immense physical and economic problems: heat, drought, intense rain events, floods, sea level rise, desertification, reduced food production and infrastructure destruction can severely injure national economies.<sup>19</sup> The U.S. and other rich nations will also be obliged to aid developing countries devastated by climate change, in

<sup>14</sup> Tara Drozdenko, "The Congressional Commission's strategic posture report is not about nuclear deterrence, but warfighting," *Bulletin of the Atomic Scientists*, November 8, 2023
 <sup>15</sup> William J. Perry and Tom Z. Collina, *The Button: The New Nuclear Arms Race and Presidential Power from Truman to Trump,* Ben Bella Books 2020, pp. 59-65

<sup>16</sup> Global Zero Commission on Nuclear Risk Reduction, "De-alerting and Stabilizing the World's Nuclear Force Postures," April 2015, available through <u>www.globalzero.org</u>

<sup>17</sup> See, e.g., Ulrich Kühn, Neil Renic, and Marina Favaro, "Negative Multiplicity: Forecasting the Future Impact of Emerging Technologies on International Stability and Human Security," International Foundation for Peace Research and Security Policy at the University of Hamburg, September 2022; Stockholm International Peace Research Institute, "Artificial Intelligence, Strategic Stability and Nuclear Risk," June 2020, available through <u>www.sipri.org</u>
<sup>18</sup> Fact Sheet: U.S. Nuclear Weapons Modernization: Costs & Constraints - Center for Arms Control and Non-Proliferation, updated May 2023

<sup>19</sup> Kenneth C. Brill, "A New Argument for Nuclear Arms Control: Climate Change," Arms Control Today, November/December 2023, pp. 6, 7

<sup>&</sup>lt;sup>13</sup> Quoted in Kimball, *supra* note 10.

order to limit the damage from climate-forced mass migration.<sup>20</sup> In addition to being unnecessary, counterproductive, and extremely dangerous, the proposed nuclear buildup is simply not affordable.

Calls for more "low yield" or "theater-range" nuclear weapons to provide additional "options" are based on the delusion that nuclear escalation could be controlled. In 2018, NATO staged exercises in Europe which included war gaming various scenarios of limited nuclear war with tactical weapons. The result, according to General John Hyten, then the commander of U.S. Strategic Forces: "It ends bad. And the bad meaning it ends in global nuclear war."<sup>21</sup>

The proposed arsenal buildup, and the arms race which would inevitably follow, could permanently foreclose the possibility of effective arms control and disarmament agreements.<sup>22</sup> Although conclusion of an arms control agreement with Russia is unlikely while the Ukraine war continues, there is an urgent need to work on the technical and scientific issues now. The disruptive emerging technologies cited above present a host of complex issues which would need to be resolved in such an agreement, and the rapid pace of technical development is narrowing the window of time within which they could be resolved.

A leading arms control expert has warned<sup>23</sup> that, because of the rapidly advancing technology, "... even the stealthiest or most well protected nuclear weapons will become vulnerable in the future," and that "[c]onfidence in the survivability of second strike capabilities ... has been a strong factor in maintaining the stability of mutual deterrence." Clearly "stability" is at best a relative term here, since the deterrence system has several times brought us close to accidental nuclear war, but it is certainly true that increases in the perceived vulnerability of second strike capabilities can only increase the likelihood of catastrophic miscalculation in response to a false alarm.

Instead of sabotaging chances for arms control by an unnecessary and dangerous arsenal buildup, we should seek to accelerate expert dialogue and other work on technical and risk reduction issues. The Biden administration seems to be aware of this, and has taken some steps in that direction, but more could be done. The helpful statement by National Security Advisor Sullivan about U.S. willingness to discuss technical and risk reduction issues without

<sup>&</sup>lt;sup>20</sup> Ibid.

<sup>&</sup>lt;sup>21</sup> Daryl G. Kimball "New Tactical Nuclear Weapons? Just Say No," *Arms Control Today*, May 2022

<sup>&</sup>lt;sup>22</sup> While the Commission is very pessimistic about prospects for arms control, it notes: "The ideal scenario for the United States would be a trilateral agreement that could effectively verify and limit all Russian, Chinese, and U.S. nuclear warheads and delivery systems, while retaining sufficient U.S. nuclear forces to meet security objectives and hedge against potential violations of the agreement." Report of the Congressional Commission, p. 85

<sup>&</sup>lt;sup>23</sup> Rose Gottemoeller, "The Case Against a New Arms Race," *Foreign Affairs*, August 9, 2022

preconditions elicited a Russian statement of willingness to consider any written proposal,<sup>24</sup> but apparently no such proposal has yet been sent; that should be done as soon as possible. The U.S. initiation of expert risk reduction talks under the P5 process was a constructive step, as was the U.S.-China discussion of arms control and non-proliferation in early November. Now the U.S. should also seek to restart the U.S.-Russian-U.K. expert talks on cyber security, which had made significant progress before they were interrupted by the war in Ukraine.<sup>25</sup> Meanwhile the U.S. should refrain from any actions, such as new nuclear-sharing agreements or new deployment of nuclear weapons in Europe, which would unnecessarily risk prolonging or escalating the war in Ukraine, as well as violating commitments under the NPT.

A "numbers game" approach to nuclear security is irrational in the face of scientific evidence on nuclear winter. Arguments in favor of increasing nuclear arsenals studiously ignore the mass of scientific evidence showing that a major war with even the existing arsenals would devastate the entire planet. Hundreds of millions of deaths from blast, fire and radiation would be only the beginning; smoke and soot from nuclear fire storms would linger in the atmosphere for years, and the resulting nuclear winter would cause global famine. A 2022 study found that a major nuclear war would cause five *billion* deaths.<sup>26</sup> The nuclear weapon states have been ignoring similar studies for years,<sup>27</sup> but ignoring the evidence will not change the facts.

Some government leaders have privately expressed concern that widespread knowledge of the nuclear winter/famine data could "undermine deterrence." It does indeed highlight the absurdity of a security system based on mutual threats of "self-assured destruction."<sup>28</sup> The only rational response is for the nuclear weapon states to honor their obligation under Article VI of the NPT to negotiate the mutual and verifiable elimination of their nuclear arsenals.

## We are at a critical point in the struggle to eliminate the danger of nuclear war. The proposed nuclear arsenal buildup would send us in the wrong direction.

<sup>&</sup>lt;sup>24</sup> Shannon Bugos, "Russia to Consider U.S. Arms Control Proposal," *Arms Control Today*, July/August 2023

<sup>&</sup>lt;sup>25</sup> "Reducing Cyber Risks to Nuclear Weapons: Proposals from a U.S.-Russia Expert Dialogue," Nuclear Threat Initiative, September 13, 2023, <u>www.nti.org</u>

<sup>&</sup>lt;sup>26</sup> Xia Lili, Alan Robock, Kim Scherrer, Cheryl S. Harrison, Jonas Jagermeyr, Charles Bardeen, Owen B. Toon, and Ryan Heneghan, 2022, "Global food insecurity and famine from reduced crop, marine fishery and livestock production due to climate disruption from nuclear war soot injection," *Nature Food*, <u>https://doi.org/10.1038/s43016-022-00573-0</u>.

<sup>&</sup>lt;sup>27</sup> See, e.g., Cameron Viza, "The climate blind spot in nuclear weapons policy," *Bulletin of the Atomic Scientists,* November 2, 2023

<sup>&</sup>lt;sup>28</sup> Akan Robock and Owen Toon, "Self-assured Destruction: The Climate Impacts of Nuclear War," *Bulletin of the Atomic Scientists*, September 1, 2012