

The United States' Nuclear Inventory

The nuclear age began on July 16, 1945, when the United States <u>tested</u> the first atomic bomb. Less than a month later, the United States would become the only nation to use nuclear weapons in a conflict, dropping atomic bombs on <u>Hiroshima and Nagasaki</u>. At its peak, the United States had <u>more than 31,000</u> nuclear weapons in its stockpile. Through various arms control agreements and unilateral reductions, the United States has a total inventory of around <u>5,550</u> nuclear warheads. These weapons are deployed on air, sea, and land platforms in what is referred to as "<u>The Triad</u>."

Since the end of the Cold War, each U.S. President has directed their administration to create a Nuclear Posture Review (NPR) outlining the role of U.S. nuclear weapons. President Trump's NPR states that America's nuclear forces are "directed toward deterring aggression and preserving peace." While some of the content in the 2018 NPR is similar to past reviews — including the policy of ambiguity over when the United States would use nuclear weapons — there is a renewed emphasis on the role of nuclear weapons in the U.S. national security strategy, and a call for "supplemental capabilities" in the form of new low-yield weapons.

How Many?

The United States' total <u>estimated</u> nuclear inventory is 5,177, with around 3,700 active warheads in the stockpile and another 1,477 retired warheads awaiting dismantlement. Under the 2010 New Strategic Arms Reduction Treaty (<u>New START</u>), the United States is allowed 1,550 nuclear warheads on 800 strategic launchers, only 700 of which can be deployed.

Air

The U.S. Air Force operates a fleet of <u>20 deployed</u> B-2 bombers and 46 deployed B-52 bombers. The B-2 bombers can carry 16 gravity bombs, while the B-52 bombers carry 20 cruise missiles, each equipped with one warhead. The F-15 and F-16 fighter aircrafts are dual-capable and can carry the B61 gravity bomb. The United States is in the process of modernizing its nuclear-capable aircraft with the F-35 and B-21 Raider.

Sea

The U.S. Navy has 14 Ohio-class ballistic missile submarines, eight of which operate out of Bangor, Washington, and six of which operate out of Kings Bay, Georgia. Each submarine can carry up to 20 Trident II D5 ballistic missiles. Each Trident missile can carry up to eight nuclear warheads, but usually carry four to five for an average of 90 warheads per submarine. The warheads are either the 90-kiloton W76-1 or the 455-kiloton W88. A small number of W76-2 low-yield warheads have also been deployed on some Ohio-class submarines.

Land

The United States has 400 Minuteman III intercontinental ballistic missiles (ICBMs) stationed in silos in the upper Midwest and Rocky Mountain areas. Each ICBM carries one warhead, either a W87 or W78. The Minuteman III missiles underwent a multi-billion dollar modernization program in 2015, extending the service life of these missiles to 2030. The Air Force would like to replace the Minuteman IIIs with the Ground-Based Strategic Deterrent (GBSD). The proposed program would cost more than \$100 billion and consist of 666 missiles – 400 for deployment and 266 for test launches or as spares.