Welcome to USAF Center for Strategic Deterrence Studies News and Analysis. As part of the CSDS mission to develop U.S. Air Force, Department of Defense, and other government leaders to advance the state of knowledge, policy, and practices within strategic defense issues involving nuclear, biological, and chemical weapons, we offer the government and civilian community a source of contemporary discussions.

Feature Report


RAND: "This Perspective presents an overview of the principal arguments publicly advanced for and against continuing the GBSD program of record. Intended to assist Air Force officials' decision-making, it describes the role of the Triad in U.S. nuclear weapons policy, surveys the current strategic landscape, and outlines the major nuclear modernization programs of record, as well as describing and assessing the major objections related to fielding a new ICBM." Read Report.

Nukes and Deterrence, Counter-WMD, and Arms Control in News and Research

NUCLEAR WEAPONS AND DETERRENCE

• RAND to USAF: Don’t Take GBSD Support for Granted (Air Force Magazine)
A new report by the RAND Corp. cites support from the White House and Congress for modernizing the nuclear triad, but its authors also offer a stark warning to the Air Force.

• Angst Over China, Russia Lessens Chance of U.S. Nuke Changes (Real Clear Defense)
The outlook will be clearer when the Biden administration completes its so-called nuclear posture review.

• ICBM Feud Flares Up Over Tiny Review of 50-Year-Old U.S. Missile (Bloomberg)
The tiff reflects a divide over the role of nuclear weapons in U.S. defense policy -- and in defense budgeting -- and it foreshadows a major political battle this year.

• Validating Deterrence Models for Scanning Technologies (Homeland Security Affairs)
The use of scanning systems ... at border checkpoints is said to act as a deterrent to the smuggling of radiological/nuclear materials, drugs, and other illicit items. Can such deterrent effects be measured?

COUNTER-WMD

• Congress Gives Missile Defense Agency Authority to Research and Develop Laser Tech for Missile Defense (Defense News)
Riki Ellison, who heads the Missile Defense Advocacy Alliance, said, in a way, the provision restores funding and responsibility MDA previously had to pursue directed-energy technology programs.
What It Means to the Region after U.S. Bases in Asia Strengthen Missile Defenses (NPR)

Plans to upgrade U.S. missile defenses in South Korea have residents worried, and could complicate relations between South Korea and its neighbors.

West: Syria Must Answer 20 Questions on Its Chemical Weapons (AP in Seattle Times)

Syria joined the Chemical Weapons Convention in September 2013, pressed by its close ally Russia after a deadly chemical weapons attack that the West blamed on Damascus.

US ARMS CONTROL

China Denies US Report It’s Rapidly Growing Its Nuclear Arms (Defense News)

The U.S. Defense Department said in a report in November that China is expanding its nuclear force faster than previously predicted and could have more than 1,000 warheads by 2030.

Joint Statement of the Leaders of the Five Nuclear-Weapon States (White House)

"We reaffirm the importance of addressing nuclear threats and emphasize the importance of preserving and complying with our bilateral and multilateral non-proliferation, disarmament, and arms control agreements and commitments."

China, U.S. Signal Arms Control Intent in Statement With Nuclear States (Newsweek)

According to 2021 estimates by the Stockholm International Peace Research Institute, America and Russia have 1,800 and 1,625 nuclear warheads respectively ...

COMMENTARY

When Software Bugs Go Nuclear: Testing a Digital Arsenal (War on the Rocks)

"Digitally upgraded weapons rely on software, and standard software-testing practices are inadequate protection against failures when the code underpins life-or-death mechanisms."

Hard Power and Conventional Deterrence Still Matter, Just Ask Putin (Breaking Defense)

“What is needed is fewer new slogans like “Integrated Deterrence” and more, serious conversations about America's strategy toward Moscow and Beijing.”

How Cold War I (US-Soviet) Is Different From Cold War II (US-China) (Eurasia Review)

“The United States, Britain, and Australia have publicly demonstrated nuclear deterrence against China through the AUKUS nuclear military alliance.”